HANDICAPPING THE HANDICAPPED

Handicapping the Handicapped

DECISION MAKING IN STUDENTS' EDUCATIONAL CAREERS

Hugh Mehan, Alma Hertweck, and
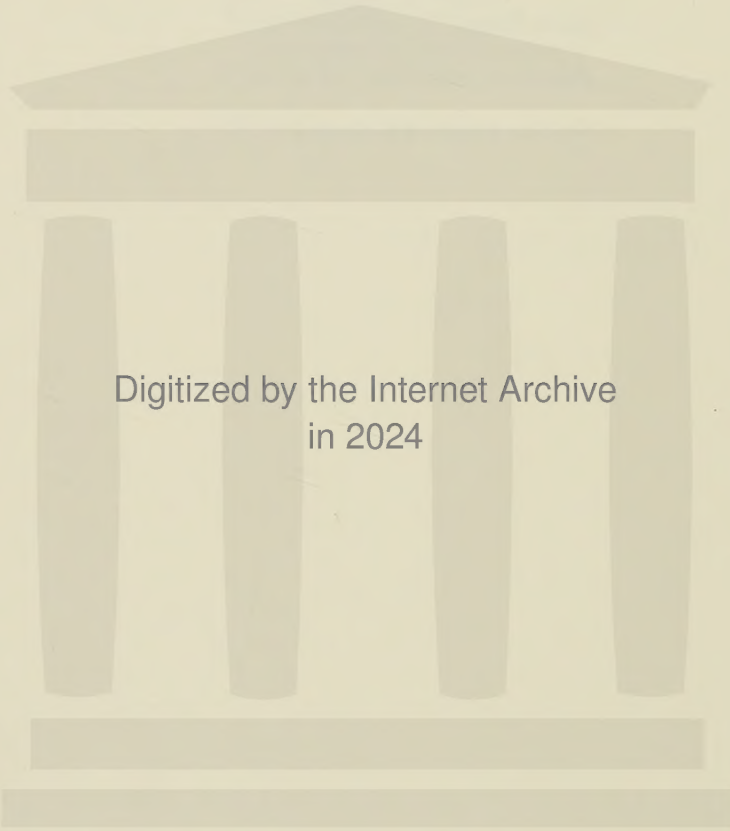*J. Lee Meihls*

To Norma, who made it all possible

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PREFACE

Like other researchers who are concerned with issues of equality and inequality in American society, we are trying to understand how it is that people attain places or positions in our society. This concern has led us to consider the role of schooling on students' careers while they are in school. The question of whether schooling makes a difference in people's lives is the essence of a larger, traditional sociological topic, that of social stratification. In its several aspects, the question is of concern also to researchers in the field, to organizational theorists, and to students of decision making and problem solving, to all of whom this book is addressed. Therefore, we examine the prevailing models of social stratification, focusing on the views of the role schooling plays on later life outcomes that are inherent in these models. The dominant methodological approach to status-attainment research has been the quantitative analysis of sample surveys of individuals. This paradigm has been successful in showing the *location* and *movement* of individuals within the stratification system. It has been less successful, however, in enlightening us about the *processes* and *mechanisms* of stratification and the role of institutional arrangements in the stratification system.

We consider the issue of the processes of stratification by reviewing studies of the social organization of schooling. These studies, conducted primarily from an ethnographic research perspective, inform us about some of the practices that operate in schools to stratify students. The community and the school system that we studied pro-

vided numerous insights into organizational decision making and the construction of educational careers, the educational system as a whole—including the interplay between federal and local levels of education, and between the school district and interpersonal contexts within the district. Our analysis eventually came to focus on three decision-making events: those that take place in the classrooms, educational testing situations, and placement committee meetings.

In conclusion, we have stated the implications of this study for social stratification theory, decision-making theory, and the status of concepts such as educational handicap. The analysis of institutional practices shows us how internal school mechanisms mediate the relationship between socioeconomic status, educational achievement, and status attainment. The detailed analysis of decision making within the educational institution demonstrates the limitations of the rational model and the importance of looking at organizational practices, standard operating procedures, availability of resources, and the cognitive categories generated by members of the institution. Educational handicaps are found to be a consequence of the enactment of these institutional practices and organizational routines in the face of legal, fiscal, and practical constraints.

CONTENTS

TABLES AND FIGURES

TRANSCRIPT CONVENTIONS

A number of transcripts of classroom, educational testing, and committee meeting interaction are included in the text for purposes of analysis and exposition. J. Lee Meihls modified the transcript conventions developed by Gail Jefferson for our purposes, as follows:

/	upward intonation
//	point at which the following line interrupts
(3)	pause of (3) seconds
( )	something said but not transcribable
(word)	probably what was said but not clear
em*ploy*ee	heavy accent or stressing
: : :	stretching of sound immediately preceding (e.g., I d : o : o) in proportion to number of colons inserted
becau—	broken word; self-interruption
hehheh	definite laughter (each heh counts as beats in laugh)
=	beat to conversation, right on top of it, no gap, no overlap (no hesitation)
(hh)	something like laughing and breathing in the middle of a word, e.g., s(hh)somet(hh)ing
(( ))	transcribed comments or whispered tone of voice

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CHAPTER ONE

THE ROLE OF SCHOOL IN SOCIETY

Social equality is one of our nation's fundamental ideals. This ideal is generally expressed in terms of equality of opportunity. Regardless of the circumstances of one's background, e.g., social class, race, or ethnicity, members of our society are presumed to be provided with an opportunity to improve their station in life. Chronic unemployment, lingering segregation, and widespread poverty show that this ideal has not yet been met. While social inequality is a social fact in American society, the contribution of the school to inequality is a matter of debate. Do schools make a difference in people's lives? The question has been phrased in many different ways: Does going to school change the way people think? Does getting a better education lead to a better job? Does doing well in school improve people's career chances?

We address the issue of the school's contribution to people's career opportunities in this study. However, we approach this topic in a way that differs from many previous studies. Conventionally, people's background characteristics have been correlated with their activities in later life, on the basis of data from a quantitative analysis of sample surveys. Although survey research has succeeded in showing the movement of people within the stratification system, it has been less successful in providing information about the processes of social mobility (Treiman and Robinson, 1981; Apple, 1982; Cicourel and Mehan, 1984; Hallinan, 1984).

In an attempt to get closer to the processes that facilitate or handicap mobility, we describe the day-to-day practices of educators when they decide to promote students, retain them, or place them in special

Education

Socioeconomic
origin variables → Socioeconomic
status
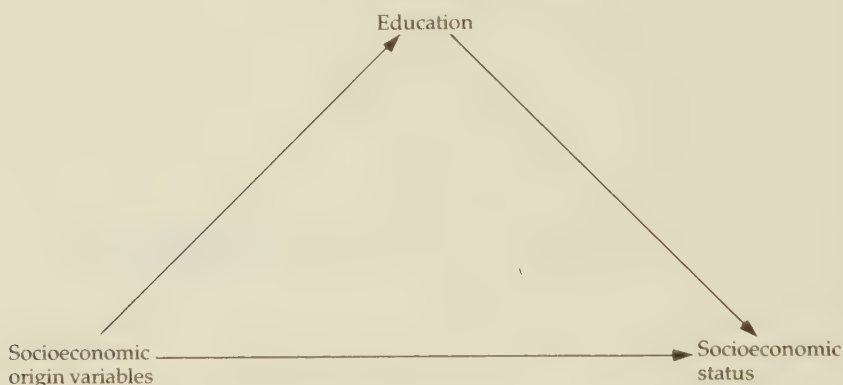
Fig. 1. A simple model of schooling and the intergenerational transmission of socioeconomic status

education programs. These routine decision-making activities have the consequence of sorting students into particular educational categories, such as "learning disabled," "educationally handicapped," or "normal." Since we are looking at how schools classify students and provide educational opportunities to them on the basis of this classification, this is a study in educational classification and educational equity (Bernstein, 1973).

The study of educational classification and equality of opportunity is part of a larger sociological topic, that of social stratification. An examination of the prevailing models of social stratification will serve to illuminate the views of the role of schooling on people's career opportunities.

In prevailing theory, social stratification is cast in terms of status attainment. The models, despite their diversity and disagreements on findings, employ similar components in their formulations of social stratification: background socioeconomic variables, attained socioeconomic status, and education. Simply stated, the attained socioeconomic status of an individual is said to be a function of background socioeconomic variables (e.g., parents' income, education, and occupation) and factors independent of social origins (including education and individual achievement). This status attainment model of social stratification, as presented by Bielby (1981: 6) is shown in Figure 1. Casting the issue of social stratification in this succinct form is extremely useful, because it helps us conceptualize the relative influence of background variables and schooling on attained status. In fact,

the various stratification theories can be distinguished based on the role that schooling is said to play in status attainment. Some theories view school as a mediator or a channel of social mobility; others view school as a transmitter of status privileges from one generation to the next, thereby reproducing and maintaining the status quo. Discussions between these mobility-mediation and reproduction theories, therefore, turn on the extent to which schools make a difference in the lives of the people who attend them.

THE SCHOOL AS A CHANNEL OF SOCIAL MOBILITY

There has long been an egalitarian political and educational ideology in this country that views people's chances for success in life as primarily the result of personal achievement, individual effort, and hard work. This ideology derives in part from the British empiricist tenet that the individual's mind is a *tabula rasa* at birth, to be etched by learned experiences. A more recent, albeit extreme, form of the egalitarian ideology is represented by Skinnerian behaviorism, which holds the influence of internal mechanisms on learning to be negligible compared to the influence of environmental conditions. In general, the egalitarian perspective is optimistic concerning the possibilities of change in people's lives. It acknowledges hereditary influences but does not see them as capable of limiting human potential or handicapping development. The conditions of place or position in the social order from which people start their lives are not permanent; they can be improved or worsened.

An important sociological manifestation of this ideology is the "functionalist" view of the school with respect to social mobility. In such presentations (e.g., Davis and Moore, 1945; Parsons, 1959; Dreeben, 1968), the society is depicted as a system of positions or statuses, which are roughly equivalent to occupations. These statuses are arranged in a hierarchical order in terms of their importance for the preservation and maintenance of society. The positions that are the most important and require special skills for their performance are bestowed with the most prestige and rewards. The society must ensure that the duties associated with the functionally most important positions are performed by the most qualified people. This matching of talent to positions cannot be left to chance; that could waste precious talent, the argument continues. People without requisite talent might wind up in key positions, while people with important talent might find themselves in less important positions. Therefore, an efficient so-

ciety must have mechanisms to select and channel people into the appropriate occupational slots.

Schools have been among the most important institutions to fulfill the function of matching talent to positions in industrialized, corporate societies. They do so by teaching cognitive skills: the general skills needed for problem solving, logical inference, computation, and abstract thinking; they are not necessarily the particular skills required for a certain job.

The functionalist view of the role of school in society is grounded in the human capital conception of work (Becker, 1964; Karabel and Halsey, 1977). "Human capital" is a rather vague term referring to cognitive skills and the capacity to learn. Employers are willing to pay more for the services of people with greater amounts of human capital, because productivity is assumed to increase with the quality of labor. The school serves two main functions for developing human capital: teaching these cognitive skills and evaluating students' acquisition of them.

The view that status is, and should be, attained on the basis of hard work, effort, and merit, and not passed on from one generation to another through inheritance, is inherent in the American equalitarian credo. It is, therefore, the responsibility of the school to provide all children with equal opportunity to acquire the cognitive skills necessary for the pursuit of improved status. In U.S. schools the operation of a "contest-mobility system" (Turner, 1960), in which virtually everyone has a chance to compete for important positions, fosters equality of educational opportunity. Such competition is achieved by delaying and minimizing the selection for positions as long as possible. Although people will eventually wind up in different positions, they all receive equivalent training, cognitive skills, and treatment. Concomitantly, minimal restrictions are placed on opportunities for success and failure. In short, the system provides a vehicle for all people—the children of the poor and the children of the rich—to obtain the cognitive skills and the educational preparation necessary for their chosen life and goals.

Support for this channel-of-social-mobility view of schooling is provided by intergenerational studies (e.g., Blau and Duncan, 1967; Duncan et al., 1972; Sewell et al., 1969) which demonstrate that the number of years of completed schooling influences occupational attainment. The most thorough national survey found a correlation of .60 between occupational level and years of education, as compared to

correlations of .40 between father's occupation and son's occupation, and .44 between father's occupation and son's education (Blau and Duncan, 1967: 202). This survey was able to account for 42 percent of the variance in occupational attainment: 24 percent of it attributable solely to education and 18 percent to father's position, both directly and by its effect on son's educational opportunity. Roughly speaking, the more education an individual has completed, the more income that person will earn. Tangential support for this notion is also provided by studies of the cognitive consequences of schooling that show higher level, abstract, and formal operational thinking proportionate to years of schooling, in this and a number of other countries (Rogoff, 1981).

THE SCHOOL AS A TRANSMITTER OF STATUS PRIVILEGES

Faith in egalitarian ideology with its channel-of-mobility view of schooling, which maintains that success in life is the result of individual effort and hard work, has been shaken in recent years—in both political and academic circles. In the political arena, the "New Federalism" of the Reagan administration has decreased support for educational programs and research, as part of general cutbacks in social programs. One of the arguments used to justify such dramatic shifts in policy stated that liberalism has not worked. Although this administration has not used social science research to justify its claims, a previous assault on the egalitarian ideology, during the Nixon administration, rested on research that seemed to conclude that "schools don't make a difference" in educational or occupational mobility.

In academic circles, one major challenge to egalitarian ideology comes from "nativists," who assign greater weight to heredity than to environment in determining life chances. A second challenge comes from "conflict theorists," who contend that schooling merely recapitulates the existing social order in society. Both groups of theorists see the school as a transmitter of class or status advantages from one generation to another.

The Nativist Critique

Nativists (most recently Jensen, 1969, 1980; Herrnstein, 1974) argue that genetic factors are the most important determinants of intellectual growth. Like a hothouse, the enrichment of environment may speed the rate of growth, but the final product will not exceed geneti-

cally programmed capabilities. Nativists cite studies comparing the differences in IQ among twins reared apart, cross-generation studies, migration studies, and studies of Headstart programs, to support the claim that heredity accounts for the greatest proportion of the variance in measures of intelligence. A recent inference drawn from the nativist position is that blacks have a genetic inferiority; therefore, no amount of education will increase their chances for upward mobility.

The nativist position on the role of heredity in intelligence and school achievement is, in essence, a version of biological determinism: social and economic differences between human groups (primarily races, classes, and sexes) arise from inherited, inborn distinctions. The ranking of races, classes, and sexes by inborn worth is not a recent phenomenon; it has been traced by Gould through Spearman, Lombrosso, Lincoln, and Jefferson back to Plato. The ranking of groups based on the results of intelligence testing is the most recent manifestation of a cultural measurement process that has included measuring heads (Morton's craniology) and bodies (Lombrosso's criminal anthropology) (Gould, 1981).

In all its manifestations, biological determinism seems to incorporate two fallacies: (1) reification and (2) ranking. When we have recognized the importance of mentality in our lives, the concept of intelligence has been used to characterize this complex, multifaceted set of human capabilities. This shorthand symbol is then reified, and intelligence achieves its dubious status as a unitary thing. Ranking requires a criterion for assigning all individuals to their proper slots in a single series. The common denominator in all nativist accounts of intelligence and school achievement has been quantification, i.e., the measurement of intelligence as a single number for each person—whether that number be a skull size, a brain size, or an intelligence quotient. The quantification of intelligence as one number for each individual has facilitated the ranking of people in a single series of worthiness. When this is done, the presently oppressed and disadvantaged groups appear to be innately inferior and, furthermore, to deserve their status. Thus, biological determinism has real utility for the political and economic groups that are in power, for it justifies rankings that are observed in society by declaring them to be natural.

Although the nativist critique shifts its grounds from environment to heredity, it is not really a rejection of the channel-of-mobility perspective. A faith in a natural predetermination is essential to the functionalist philosophy of education. It may be true that schools provide equal educational opportunity in preparation for future life outcomes;

yet functionalists also hold that the eventual outcome depends solely on the individual's inherent propensities, a position that is essentially the same as the nativist's.

The Conflict Perspective

The challenge to the channel-of-mobility perspective from those researchers who depict groups in society as competing for status, power, and prestige has two main variants. One, represented by Bourdieu and Passeron (1977) and Collins (1971, 1977, 1980), sees the conflict in Weberian terms of status; the other, represented by Bowles and Gintis (1976), Willis (1977), Giroux (1981), and Apple (1979, 1982), sees the conflict in Marxian terms of class. In both variants, schools play a similar role: to maintain the status quo.

The channel-of-mobility perspective assumes that society is increasingly meritocratic, and by making cognitive skills available to all members of society, schooling provides equal educational opportunity. Collins's critique attacks the assumption that cognitive skills are the crucial link between education and jobs. The main activity of the schools, he says, is not to teach cognitive skills; it is to teach particular status-cultures: "vocabulary and inflection, styles of dress, aesthetic tastes, values and manners" (Collins, 1977: 126–27). Collins rejects the claim that schools function to fill needs arising naturally from the economy in favor of the conclusion that schools are the arena within which various status groups vie for control of wealth, power, and prestige. He also claims that schools are the political spoils for the dominating status-culture. The problem that Collins has with the channel-of-mobility point of view is not so much that schools do not impart relevant survival skills, but that functionalist descriptions of how society works are neither realistic nor accurate. The first allegiance of schools is to the dominant cultural, political, and economic groups, not to groups seeking higher status through technical job-seeking skills.

To understand Collins's claims, consider the relationship between college grades, occupational success, and future earnings. Given that grades are a rough measure of skills taught in college, if schools are fostering mobility, then the graduates with the higher grades should attain higher statuses and earn more money; those who do well in college, other things being equal, should obtain better jobs than those who do not do well in college. However, studies of the relationship between grades and occupational success do not find much support for the mobility-mediator view of the link between schooling and oc-

educational attainment. In a 20-year follow-up study of high-school graduates in several cities Collins (1979: 19) found that grades in high school were related to income only if the student went on to graduate from college. A study of living college graduates in 1947–48 found that men who reported mostly A grades in college had higher incomes than others, but the differences among B, C, and D students were negligible. Collins (1979: 20) also summarizes studies that showed little correlation between college grades and success in several professional occupations: medicine, military service, business, engineering. Individuals who obtain better grades may obtain better jobs and earn more money, but this trend largely disappears when educational attainment, family background, and socioeconomic status (SES) are controlled (Jencks et al., 1972). Jencks reports, for example, that people from middle SES groups with a certain IQ had a 47 percent chance of being in the top fifth of wage earners, while lower SES groups with the same IQs had but a 6 percent chance of achieving this intergenerational mobility.

Berg (1971) challenges the equation between education and earnings in another way: are men and women who complete high school or college subsequently able to earn more money than those who don't attend? The issue is whether higher earnings are a reflection of better performance due to more education, or the result of factors other than the diplomas they have acquired. Berg dismisses the use of data on gross earnings as a measure of the relation between education and earnings in favor of data on employee performance such as productivity. He reports the results of studies on blue-collar, white-collar, and professional workers in identical or similar jobs but with different educational backgrounds, in order to determine whether differential educational achievements might be related to differences in organizationally relevant behavior, rather than in education per se.

He measured the productivity, worker turnover, and absenteeism of 585 female workers in a Mississippi textile plant and found that educational achievement was inversely related to job performance thus conceived. Whereas 57 percent of the long-term employees had 10 or more years of schooling, 71 percent of the short-term employees had 10 or more years of schooling. Furthermore, the education of high producers did not differ from the education of low producers, where productivity was measured by units of piecework—a highly reliable measure. In fact, the less productive were slightly better educated than the more productive workers (Berg, 1971: 87).

A similar pattern emerged from a study of 762 workers in four departments of a Southern hosiery-manufacturing plant. Productivity (again, measured by piecework) and turnover were related to age and family stability, but were not associated with educational achievement. Also, in department stores, auto assembly plants, and among installation-crew members Berg found education not to be correlated with promotion. Short-term employees had a median of four-and-one-half semesters of college education; a matched sample of employees with longer service, on the other hand, had completed only slightly more than three semesters of college. Longer-term employees scored lower on an IQ test than short-term employees, and there was no association between education and absenteeism or between employees' evaluations and education (Berg, 1971: 88–91). These findings were surprising to the workers' managers and would be surprising to "human capital" theorists who assume that education produces smarter, more ambitious, and better-disciplined workers. Berg's careful and ingenious analysis suggests that better-educated people get ahead by changing jobs; their less-educated peers, meanwhile, stay behind and move into higher-paying if not always higher-skill jobs, a finding that suggests that education (as measured in terms of years of schooling completed) does not contribute to performance on the job, but helps people get jobs in the first place.

A negative relationship between education and job performance was not limited to blue-collar occupations. Berg's analysis of the merit increases of more than one hundred secretaries employed by a large magazine publisher revealed no discernible relationship between performance records and education. So, too, the insurance-sales records of high-school graduates rarely differed by more than a few percentage points from those of comparable numbers of college graduates (Berg, 1971: 92–93). Only among professional and managerial workers did Berg find the expected relationship between education and income, suggesting that salaries for less than the M.A. level are determined by organizationally relevant considerations, but primarily on the basis of academic degrees at the M.A. and Ph.D. level.

Such findings counter the mediator-of-mobility view of the relationship between schooling and attained status by arguing that educational credentials are used to ration access to high-status positions. The situation, that people with more education attain better jobs, does not seem to be the result of cognitive skills developed in school. Rather, the holding of credentials fosters this mobility. Furthermore, inter-

generational mobility seems to decline markedly when measured in terms of increased control over disposable wages, and not in terms of total dollars earned.

A variation on the status-conflict challenge to the mobility-mediation perspective comes from neo-Marxists who emphasize the influence of social-class origins on achievements in later life. Using comparisons of the long-term effects on schooling (e.g., studies conducted by Coleman et al., 1966; Jencks et al., 1972), Bowles and Gintis and others have concluded that the quality of schools has little influence over a student's achievement. Instead, they say, the social-class backgrounds of students when they enter school seem to exert the greatest influence on the ultimate educational and economic opportunities. Bowles and Gintis assert that the function of schooling is to maintain existing class relationships. They rest their claim on the observation that, historically, there has been a persistently high degree of inequality in income distribution and property ownership concomitant with an increasing equality in the distribution of education.

Bowles and Gintis interpret these trends in terms of orthodox Marxism, blended with ideas from functionalist theories. They claim that schooling in capitalist societies is rationally and purposefully organized to train the elites to accept their place at the top of the economy, and to train the workers to accept their lowly places in the class economy. Schooling effectively develops the functionally appropriate work-attitudes for both the superordinate and the subordinate economic positions that students will inherit. Schools initiate young people into the world of work by exposing them to the "hidden curriculum" of the school. This curriculum varies for students of the two classes—a situation that is made possible by the ways in which schools are organized. Since children go to neighborhood schools, there is an inherent separation of those from workers' families and those from the elite. The majority of occupations in American society require a loyal and compliant labor force to perform jobs with little discretion or responsibility. Therefore, the hidden curriculum of the schools in working-class neighborhoods teaches docility, rule-following, passivity, and obedience to external authority. Individuality and creativity are suppressed in favor of conformance to organizational demands, rhythms, and routines. For the elite classes, the hidden curriculum encourages students to work at their own pace without supervision, to make intelligent choices among alternatives, and to internalize norms rather than follow externally constraining norms.

Bowles and Gintis dismiss the meritocratic thesis inherent in the mediation-of-mobility position. Their thesis is that schools serve a mystification function, by convincing people that hard work and individual effort are the keys to success, while sub rosa keeping the elite classes in power and the working classes out of power, albeit in the work force itself. It is essential for the legitimization of the capitalist order that the population be convinced that people in elite positions deserve to be there, and that people in lowly positions have reason to accept their fate.

A CRITIQUE OF THE CLASS CONFLICT CRITIQUE

There are problems with the class-conflict position on the role of school in society. Good social science evidence supports the general claim that there is little circulation of the elites and little upward mobility (Jencks et al., 1972), but there is less evidence for the causal connections inherent in the class-conflict position (cf. Giroux, 1981). Bowles and Gintis exaggerate the degree of integration between the demands of the elites and the organization of schooling. Their claim that schooling reproduces the class structure implies a closer correspondence between schools and society than the evidence seems to warrant (Apple, 1982). Both functionalists and class-conflict theorists perceive the schools as teaching what the wider society would want them to teach, and what is taught is effectively learned. By this view, schools become passive transmission belts, faithfully conveying the ideals, values, and knowledge of society to the next generation. Such assessments attribute to elites and school administrators a rationality and an intentionality that has not been demonstrated. It is one thing to say that the curriculum and the organization of classroom instruction has certain characteristics, such as an appeal to external authority and a demand for conformity to rules, and it is quite another to say that these facets of education are organized in a causal manner by elites who have dictated their inclusion in the curriculum. Furthermore, the "correspondence principle" inherent in Bowles's and Gintis's account minimizes the competing interests inherent in schools. It also fails to acknowledge the fact that the school has a separate system of organization that, although influenced by society, is not directly linked to it.

There are important influences that come between the structure of class relationships and status attainment, such as derive, for example, from students' culture. Adopting a version of the "culture of poverty" argument current in the United States a decade earlier, Willis says

(1977) that British working-class "lads" create their own culture of resistance to school knowledge. By their socially inappropriate behavior, their truancy and disruption of school routines, the lads disqualify themselves from the opportunity to enter middle-class jobs. Ogbu (1978) argues that future expectations influence the relationship between SES and performance in school. His evidence from comparative studies of education suggests that black children perform poorly in United States schools because of the self-fulfilling prophecies associated with perpetual low-caste status. When a group, such as blacks in this country, have been in low-caste status for generations, its members will perceive limitations on job opportunities as a consequence. Seeing no possibility of advancement, they fail to develop incentives, motivation, and the competitive skills needed for advancement or for entry into middle-class jobs.

The studies by Willis and Ogbu are important because they suggest that it is necessary to modify the direct relationship between the structure of class relations in society and later status-attainment found in Bowles's and Gintis's presentation. Willis suggests that students' culture mediates between the structure of society and outcomes later in life, while Ogbu says "incentive motivation" is an intervening variable between SES and school achievement.

Finally, Bowles and Gintis make a special claim for the role of schooling in capitalist societies: it is uniquely directed towards the preservation of class inequalities. In order to demonstrate that a special relationship exists between the elites and schools in capitalist societies, class-conflict theorists would have to show that a different form of schooling prevails in capitalist and noncapitalist societies. If class-conflict theorists are correct, then we should expect to find a distinctly different form of education in countries with distinctively different politico-economic systems. If, however, status-conflict theorists like Collins are correct, then we should expect schooling in countries like the Soviet Union, Cuba, and China to have a hidden curriculum, status competition, and credential inflation. If such arrangements are apparent in societies with different political economies, then we have reason to believe that the preservation of the status quo is a feature of industrialized bureaucratic societies, not only of capitalist societies. Admittedly, there are not enough comparative studies of the sort needed to answer this question. The available evidence seems to indicate, however, that the elites of countries with many different socioeconomic systems, capitalist and noncapitalist, organize institutions

to protect their interests. Status-preservation activities do not seem to be the exclusive domain of capitalist elites. In that sense, schooling does not seem to be selective. It is as effective in reproducing the social order in socialist countries as it is in capitalist countries.

SUMMARY

In prevailing theory, then, social stratification is cast in terms of status attainment. The attained socioeconomic status of an individual is said to be a function of background socioeconomic variables and factors independent of social origins. Survey research has been the staple technique in status-attainment studies. It takes the form of an input/output model that is important because it permits questions about the influence of students' characteristics and of schools on students' later-life outcomes. Furthermore, it addresses a fundamental social issue: the extent to which our society is meritocratic, providing equality of opportunity for all its members, regardless of background characteristics.

In spite of the quantitative analysis of sample surveys of individuals, we still do not know why some variables are associated, or the conditions under which one would expect to find the associations. Therefore, we need to know more about how school practices and peer-culture contribute to the generation of social stratification. Do schools make a difference in contributing to people's career opportunities? Opinion on this matter is divided among researchers: those who see schools as mediators of social mobility answer this question in the affirmative; those who see schools as transmitting class or status advantages from one generation to another answer in the negative.

Mediators and transmitters may differ in their opinions about the origins of a person's success in later life, but it is evident that they share a similar opinion about the social organization of schooling. Both perspectives seem to operate on the assumption that the internal workings of schools are not particularly influential on the status that people attain in later life (Bielby, 1981: 11).

From the mediator-of-mobility point of view, schools are viewed as active, if benign, forces in the lives of students. They are *active* institutions in that they provide educational opportunities by teaching the skills needed for the marketplace; they are *benign* in that they provide these skills equally to all. According to this model, students enter school, work hard, make career choices, and enter the job market. Hence, people with the most talent, those who have worked the hard-

est, naturally rise to the top, like so much cream, and since the same educational opportunities are provided to all who attend school, they neither inhibit nor constrain individuals' attainment of goals.

From the transmitter-of-status point of view, schools are passive vehicles or conduits through which students simply pass on their way to statuses predetermined before they enter schools. In fact, for the preservation and consistency of the theory it is necessary to see schools as passive vehicles in order to conclude that heredity and social class background are more important than the school for intellectual achievement or status-attainment. Thus, from both perspectives, the school exercises very little control over peoples' lives. It is the characteristics with which people enter school that determine their position in the social order after school.

THE ROLE OF SOCIETY IN SCHOOL

There is a general consensus in the channel-of-mobility perspective about the characteristics of good schools. Good schools have modern buildings, well-equipped laboratories, large libraries, teachers with advanced degrees, small classes, the most recent curriculum materials. Bad schools lack these resources (Moore, 1981: 19). Coleman and his colleagues shook this conventional ideology by indicating that differences in such tangible school characteristics as the age of buildings, the average level of teacher training, and the number of books in the library showed no correlation with student achievement when social background was taken into account. Some researchers (e.g., Coleman et al., 1966; Jencks et al., 1972; Bowles and Gintis, 1976) concluded that differences in the characteristics of school environments were of limited consequence in determining students' academic achievement and social mobility. Not convinced by this "schools don't make a difference" conclusion, other researchers delved more deeply into the nature of the school environment. In the process, they developed more sophisticated analyses of school characteristics, to discover that schools do indeed play an active role in the lives of the students who attend them.

The liberal ideology inherent in the channel-of-mobility view of schooling is recapitulated in educational policy at the local school level. Educational policy, as stated by school administrators and as written in official documents, makes schools out to be open, "contest"-mobility systems (Turner, 1960), in which all students have opportunities to compete for the preparation necessary for occupational ca-

reers. There are, however, a number of crucial points of interaction between educators and students that occur within classrooms, or in testing and counseling sessions, and lead to decisions about students that generate differential educational opportunities. By dividing a class into ability groups and organizing curriculum differentially for students within each category, the teacher is providing differential educational opportunities. Segregating students into different academic programs, or tracks, where they receive different instruction, produces a similar result.

When the day-to-day practices of schooling at each of these crucial points of interaction is examined, we learn that differential educational opportunities are often made available to students. However, the basis upon which this stratifying takes place is complex. It is not simply the students' efforts and ability (as functionalists have maintained) or the social class of students (as certain conflict-theorists have suggested), or their inherent characteristics (as nativists have argued). A conclusion to be reached from our studies is that we must be cautious in attributing causal status to student characteristics and socioeconomic status, the variables conventionally used in theories of status-attainment.

ABILITY GROUPING: DIFFERENTIAL ACCESS TO CURRICULUM AND INSTRUCTION

Ability grouping seems to be a ubiquitous feature of American elementary schools. As the name implies, students are divided into small working groups according to a teacher's perception of the students' academic ability. Reading and math are the subjects in which students are most frequently grouped, choices that reflect the society's and educators' concerns for elementary education. Ability grouping takes two forms: in heterogeneous grouping, students of different ability are grouped together on the premise that cross-fertilization helps students of different ability; in homogeneous grouping, students of the same ability are grouped together, in the belief that students of equivalent ability can be more efficiently taught.

There is nothing inherently sinister or commendable in such practices; the existing educational research is mixed on the relative merits of the two types of grouping. Basically, it is a practical response to a pressing educational problem in ecological and demographic form: too many students, with too little time for teaching them. However, an unintended consequence of ability grouping is differential access to educational curriculum, and hence to educational opportunity.

Rist (1970) provided one of the first accounts of differential treatment in ability groups. He observed the progress of a group of first-grade children in an all-black St. Louis school from the first day of school through the end of the year, and continued to visit the same students in the second grade. Within the first few days of school, the first-grade teacher assigned students to three groups (high, medium, and low). The high group was seated near the front of the class, the middle group near the middle, and the lowest group in the back. The distribution seemed to be based on characteristics associated with SES—neatness, dress, and skin color. Children from one-parent households, or from families with an unemployed worker, were more likely to be assigned to the low group. Rist also observed differences in the treatment of the three groups. Those designated as slow learners were taught less frequently and were subjected to more control-oriented teacher behavior. And, significantly, placement into the three groups took on a caste-like character—once students were placed in one of the three groups, they did not often get out.

Eder (1982) focused on the classroom-management issue alluded to by Rist. She examined a first-grade teacher's responses to students' interruptions of others' turns at reading aloud, and found differential treatment across ability groups. With the two lowest reading groups, the teacher responded to students' interruptions by asking for further information; with the top two reading groups, the teacher discouraged interruptions. Eder explains the differential responses in terms of differences in the teacher's expectation about verbal production. Since the high-group students were more verbal than the low-group members, the teacher may not have been concerned with discouraging them, while she may have been interested in encouraging the low-group members to talk more. Eder finds support for this notion in comparisons of students' interruptions that were on-topic and those that were off-topic. The teacher ignored or reprimanded off-topic interruptions across all groups, but allowed topical interruptions twice as often in the low group and never objected to them. The teacher's differential responses also contributed to different classroom performance across reading groups. While reading-turn interruptions became less frequent in high groups, they increased in the lower groups. As a consequence, low-group members did not develop an understanding of reading turns as a speech event in which other members do not speak or engage the reader in discussion—an understanding that is essential for success in school.

Eder's findings, which are similar to Rist's (see also Gumperz and

Herasimchuk 1975; Michaels, 1981; Wilcox, 1982) in that she notes differential treatment across ability groups after an extensive observational study, differ from those of Rist in an important way. Since the students in her school were primarily from middle-class backgrounds, it cannot be said that differential teacher treatment is reserved for children from low-income families. Instead, it seems that such differentiations are the consequence and not the cause of the classification.

McDermott (1976) observed instruction in a top and a bottom reading group in a first grade in a "relatively successful school in a New York City suburb." There were ethnic differences in the two groups. All the students in the top group were white, from Jewish and Italian families. The bottom group had three Puerto Rican, one black, and two white students; one other minority boy in the class was not assigned to a reading group. Thus, six out of seven minority students in the class were in the bottom reading group, or in no reading group at all. Students in the two groups had different amounts of what Bourdieu and Passeron or Collins would call "cultural capital." Students in the top group could read; in fact they came to school already knowing how to read. By contrast, students in the bottom group could not read. Apparently as a consequence of these differences in skill, instruction was organized differently in the two groups. In the top group, the teacher had students take turns reading—one after the other, from left to right. Because children in the bottom group could not be expected to read any page that came along, the teacher spared them the embarrassment of not being able to read when their turn came up by picking a special volunteer reader for each page. This practice reduced embarrassment, but it took considerable negotiated bickering.

At the reading table the teacher positioned herself differentially in relation to the two reading groups and the rest of the class. When instructing the top group, she sat with her back to the rest of the class; with the bottom reading group, she sat on the opposite side of the table. As a consequence, students in the two reading groups had different instructional opportunities. Although both groups spent the same amount of time at the reading table, students in the bottom group spent only one-third of their time in a reading position. The teacher's position with the bottom group enabled her not only to monitor the rest of the class, but also to move to correct transgressions elsewhere in the classroom, which gave her less time with that lower group. In fact, more than half of the bottom group's reading time was spent waiting for the teacher or trying to get the teacher's attention to their pleas for a turn at reading.

Having identified differences in the organization of instruction in top and bottom reading groups, what can we conclude about the reasons for these differences? The account that first comes to mind concerns ethnic-group and social-class differences. Students from "outcaste" groups come to the school predestined in their subsequent social position because of the characteristics they possess as well as the skills they lack. Such an explanation would be consistent with the status-transmission or reproduction perspective discussed in Chapter 1. However appealing at first, it turns out to be too simple, for it neglects organizational complexities.

When McDermott and Aron (1978) point out that poor and minority students start school knowing less about how to read and write than their middle-class or mainstream contemporaries, they are not advocating a version of a "deprivation" account that attributes school failure to the inherited characteristics of lower-class students (cf. Jensen, 1969 and 1980) or to their cultural environments (Bereiter and Englemann, 1966). Rather, they are suggesting that the poor and minority students who have not learned to read before coming to school generate organizational and pedagogical consequences for teachers who are pressured to conform to the prevailing policy—namely, that students must learn how to read by age six (i.e., the end of first grade) and must demonstrate their reading skills on a standardized test. When students come to school not knowing how to read, they present organizational and pedagogical problems for teachers who are pressured to conform to this policy. The first-grade teacher's job, then, becomes not only to teach children how to read, but also to endow them with certain kinds of reading skills, by a certain date, and in a certain form.

Differences in the instruction of top and bottom reading groups can be seen as mutual adaptations to these organizational constraints: students who can't read, by arguing about turns at reading instead of actually reading; the teachers who have to teach students who can't read, by varying teaching position in order to spend time away from a difficult situation. Both the teacher and bottom-group students are making adjustments to each other's organizational quandaries. Although these mutual accommodations may be sensible in the short run, to the extent that they get teachers and students through embarrassing situations, they are regressive in the long run. The net effect of these adaptations is that children in the bottom groups fall further behind children in top groups for every day that they are in the classroom. Thus, the placement of children into a bottom group works like a self-fulfilling prophecy: they are placed in this group because they

are perceived as having low ability; they receive less-concentrated, lower-quality instruction than the children in the other groups, and at the end of the year their performance is predictably inferior to that of children in other groups.

In sum, we have here a shift in focus, from competencies viewed as the properties of persons to competencies as the properties of situations. Children's poor performance in both top and bottom reading groups is due less to their lack of skills and abilities than to the way in which schooling is organized for students with different rates of learning.

We also have a different view of the relationship between background characteristics and school achievement. Instead of direct connection between SES and attainment, the activities of schooling, i.e., the classification of students and subsequent teacher-student interaction are mediating that connection. As a consequence, the characteristics associated with social-class differences are constructed in the interaction between bottom students and teachers as a by-product of the classification into ability groups.

THE EDUCATIONAL CONSEQUENCES OF TRACKING

General education requirements are a recurrent, explicit feature of schooling. Students take a specified number of courses in English, social studies, math, science, and history. An implicit feature of schooling, in addition, is that these courses are differentiated according to difficulty; students are therefore grouped according to ability. The most difficult courses are reserved for the best students, the least difficult courses for those who are said to need the most help. Students of average ability take the courses in the middle. Hence, the placement in different "tracks" has practical consequences for students, to the extent that it affects access to college and occupations after the completion of schooling.

In one of the first case studies of tracking, Hollingshead (1949) found that the social-class divisions within the community were recapitulated in the different courses of study offered in the high school. He divided Elmstown, the Indiana community in which he conducted his study, into five social classes: (1) families of established wealth, (2) professional and business leaders, (3) small businessmen, (4) millworkers and white-collar workers, and (5) the semi-skilled, unskilled and unemployed. The high school divided its curriculum into three courses of study: college preparatory, general education, and business or commercial. The social-class divisions of the community were re-

flected in the tracks within the school. Adolescents from the first, second, and third social classes dominated the college-prep track. The general curriculum drew the majority of its students from the third and fourth social classes, and the commercial courses received students primarily from the lowest two socioeconomic classes.

Hollingshead pointed out correlations between social class and track placement, but Rosenbaum (1976) offered greater insight into some of the ways in which the tracking system operates to stratify students. The stated policy of the junior and senior high school that he studied seemed to minimize differences in curriculum, maximize options, and maintain free choice. The senior-high permitted opportunities across a considerable array of tracks; free choice was emphasized in each division, and no division was supposed to preempt the possibility of track change. Although the policy was vague, Rosenbaum said that the image projected by the school was one of a contest-mobility system, i.e., one in which students were free to compete for courses and subsequent career opportunities.

When Rosenbaum examined school records that depicted track changes over time, however, he found very little mobility. Most students stayed in the track where they had been placed originally. The changes that did occur fit into a pattern. Students rarely moved up from a non-college track, but they often moved down. Of those who did move up, very few students moved beyond the adjacent track. Fewer than 3 percent changed from the non-college to the college tracks. In contrast, 21 percent of the college-track students changed to a non-college track the following year. Downward-track mobility was thus more than seven times as great as upward-track mobility. These patterns of mobility between tracks led Rosenbaum to conclude that, instead of the advertised "contest" system, a "tournament" system was operating in this school. In a tournament model, a winning player earns only the right to go on to the next round; a losing player is out of the contest altogether. By analogy, those students who stayed in the high college-track at the end of the school year had won a round, but those who dropped a track lost the opportunity for that niche forever.

Mercer (1974) studied the placement of students in special, mentally retarded classrooms in California, where public schools were utilizing psychological-services committees to evaluate recommendations by teachers, parents, or principals, concerning individual students. The committee's decision was crucial to the future educational and social career of a student; it could recommend that the student be returned to the regular classroom, be switched to some other class-

room; be retained, demoted, or placed in a special education class-room. Decisions about special placements were then, and are now, in-formed by IQ-test results. The cutoff point on the IQ test for mental retardation at the time of Mercer's study was 80. A student scoring be-tween 80 and 100 was defined by the test as normal, perhaps "slow"; a student scoring less than 80 was defined as mentally retarded.

Although those identification criteria seem cut and dried, Mercer found that placement into the mentally retarded category was not au-tomatic. Of the 1,234 students in her study who were referred to the various psychological-services committees in the schools, 865 were given the IQ test; of these, 134 scored below 80. However, only 64 per-cent of that group were recommended for placement in mentally re-tarded (MR) classrooms. In that segment, 97 percent were boys, 75 percent were from the lowest SES category, 32 percent were Anglo, 45 percent Mexican-American, and 22 percent black. These figures are disproportionate for the overall school population inasmuch as the distribution of boys and girls was 51/49 percent, and the majority-minority distribution approximately 80 percent Anglo, 10 percent black, and 10 percent Mexican-American.

These data could be used to reinforce the view that the background of students, whether genetic (Jensen, 1969) or socioeconomic (Cole-man et al, 1966; Bowles and Gintis, 1976), accounts for differences in school achievement. This was not, however, a simple instance of poor, minority, and male students failing tests more often than their wealthy, majority, and female counterparts, for students who had similar re-sults on an objective test were in fact treated differentially by school personnel. White, female, middle-class students who scored 80 or below were more likely to be retained in regular educational programs than black, male, lower-class students who scored the same on the IQ test. The disproportionate number of poor, minority, and male stu-dents in the MR category, even when they tested as well as their counterparts, suggests that mental retardation as defined by schools does not necessarily identify an inherent characteristic or quality of the student. It is a label dictated by the institutional practices of the school.

Mercer's findings about differences in the MR population in Catho-lic and public schools makes this point even more forcefully. She found that there were no mentally retarded students in Catholic schools! Re-sisting the temptation to interpret these findings in Durkheimian terms, i.e., by equating solidarity acquired through religious training with mental health, she had group, and then individualized, IQ tests

administered to the students in the Catholic schools. The IQ distribution was roughly equivalent to that which she had found in the public schools. However, the students with IQs that qualified them for MR classrooms were not educated separately, but in regular classrooms, along with other students. Mercer concludes that these students were not mentally retarded because the Catholic schools had no such category, and hence no mechanism for having students classified in this way. Without a socially constructed lens through which to view the students, their behavior was not considered retarded; unusual, perhaps, but not retarded.

These ethnographic studies of tracking are important because they explore the school's contribution to students' performance in school and options later in life. They show that the educational practices of the school sort students into educational programs that provide different educational opportunities. Cream does not rise automatically to the top of educational tracks. It is driven there by the stratifying practices of the school.

THE COUNSELOR AS GATEKEEPER

Vocational guidance began in the twentieth century with the goal of solving labor problems by determining the labor needs of industry and planning educational programs for individual students to meet those needs. The school guidance counselor was to help the high-school student choose a career needed by society and to provide the information and educational program required to achieve that career goal. This counseling begins early in the elementary school and is well organized through the junior and senior high school. How do students obtain information and enter the educational programs (i.e., tracks) required to achieve career goals? The channel-of-mobility theory of status attainment would suggest that they have considerable influence over track placement, moving to different levels by choice, constrained only by ability and effort. The reproduction model, on the other hand, would suggest that track placement is an automatic consequence of students' socioeconomic status.

Do students choose their own track placement? Jencks et al. (1972) quote Coleman et al. (1966) as reporting that 84 percent of high-school seniors were in the curriculum of their choice—a finding that makes track placement and career options seem simple and automatic, and hence reinforces the mobility-mediation view of schooling. However, Cicourel and Kitsuse (1963), Rosenbaum (1976), and Erickson and Shultz (1982) suggest that students' career patterns are neither freely

chosen nor automatic, but are the result of socially organized decisions produced in part in counselor-student interaction.

To be meaningful, a student's curriculum choice must be based on adequate information. The single most important kind of information needed to make an informed track choice is knowledge about the preparation afforded by the chosen tracks and the consequences of that choice. Cicourel and Kitsuse (1963) interviewed high-school counselors to determine how they decided to advise black and white students of different socioeconomic backgrounds whether they should apply to college (and consequently, anticipate a professional or a non-professional occupation). They found that black students with average-to-high academic records were consistently dissuaded from college, while white students of high socioeconomic rank, who had mediocre, even low academic records, were consistently encouraged to attend college.

In the school system Rosenbaum (1976) studied, students needed to know the significance of taking a foreign language in the seventh grade, since college-track placement in the high school was dependent on that elective. More significantly, the choice of a foreign language led to the student's placement in each of the top five of the nine tracks in the junior high school. The tracks were also ranked according to assessments and IQ-test scores. Each class was paced by the ability of the section. Thus, the top language group had the most difficult history class, English class, and math class. The second highest language-group had the slightly easier class in each of these subjects, and so on. Students reported that counselors did not inform them about this aspect of the curriculum; several decided not to take a foreign language because they were not interested in travelling to foreign countries, or because they preferred to learn typing. They were not aware that this choice also meant they would receive inferior math and English classes (Rosenbaum, 1976: 117). As a result, some students who chose a certain course of study in junior-high school did not realize they had, for all intents and purposes, predetermined their later-life career options.

Students also need to know the educational requirements for their would-be careers. Rosenbaum found that some of those who wanted to be nurses, accountants, or engineers discovered too late that they needed a college education; not all of them were told of the contingencies. The student handbook, a common source of information, failed to describe the differences in track placement carefully: the general

and the college curricula seemed to be similar. What the handbook did not reveal was that the college track directed students to colleges, while the general track did not. The description of the school system based on Rosenbaum's interviews with administrators and students is different from the one projected by the official literature. The stated policy suggests that the foreign-language requirement is merely a choice of a single course. Yet this is the choice that determines both the track in which a student is placed for all classes and the level of difficulty of those classes. Furthermore, the recollections of students suggests that no free or informed choice of tracks exists: the division of ability-level is determined by the school, not elected by the student (Rosenbaum, 1976: 34).

Kitsuse and Cicourel and Rosenbaum point to some of the organizational features of the school that can contribute to career choices. Because these researchers had to rely on student recollection and faculty reports, they were hampered in their attempts to determine the grounds upon which students were advised about making track choices and why some, but not all, students were made aware of the significance of these choices. Erickson and Shultz's analysis (1982) of more than eighty counseling interviews between junior-college counselors and junior-college students gives us access to some of the interactional practices that assemble these career choices. They demonstrate how non-school aspects of career choice are introduced into the negotiations that occur in counselor-student interactions. Their analysis of the synchrony (or lack of it) between counselor and student during interviews reveals the counselor and student actively constructing students' career options.

Erickson and Shultz (1982) videotaped two different counseling sessions that illustrate this "gatekeeping" process:

38 [*Student:*] Yeah, I guess so. I might keep it up . . . my P.E. and I wanna go into counseling too, see . . . you know, have two way . . . like equal balance.

39 [*Counselor:*] I see ah . . . what do you know about counseling?

40 [*Student:*] Nothing.

41 [*Counselor:*] Okay . . .

42 [*Student:*] I know you have to take psychology courses of some sorts and counseling.

43 [*Counselor:*] Well, it's . . . this is a . . . it'll depend on different . . . but essentially what you need first of all, you're gonna need state certification, state teacher-certification, in other words, you have to be certified to teach in some area. . . . History or English or whatever happens to be your bag, P.E.

Ah, secondly, you're gonna have to have a master's degree . . . in counsel-ing . . . which you know is . . . an advanced degree [*laughs*]. That's what you have to do to get a . . . counseling . . . to be a counselor. Uh . . . at least in Illinois and it's pretty much the same anywhere you want to go.

The next transcript illustrates the interaction between another stu-dent and the same counselor:

29 [*Counselor:*] Yeah, uh, . . . are *you* still thinking in terms of two years?
30 [*Student:*] Ummm, I was, but now the more I'm getting into it the more I'm realizing that I'm starting to like it, if I can catch hold and keep the grasp that I'm goin' at now, I'd like to continue at [name of University] or some other school.
31 [*Counselor:*] Okay, this is a good point and I'm glad you brought it up. How much investigation have you done at other schools that offer programs in data processing?
32 [*Student:*] Not really down to it. I've talked to students over there that's about it.
33 [*Counselor:*] At [name of University]?
34 [*Student:*] Uh, I've talked to one student I know, he . . . never really got into the courses he started them. He said that the courses they offer are pretty good as far as he could see.
35 [*Counselor:*] Hmmmmmm. One of the problems that I I think you're gonna run into is transferability.
36 [*Student:*] Yeah, I realize that.
     [*Counselor:*] You know—
     [*Student:*] I gotta little biology—
37 [*Counselor:*] No, I'm not even so much worried about that as I am about these data processing courses.
38 [*Student:*] Why?
39 [*Counselor:*] As to whether they'll transfer and accept them at [University]—
40 [*Student:*] Well, if not then I'll just start all over. What can I say?
41 [*Counselor:*] Yeah . . . ah, well, one of the things you could say is ah . . . one of the things you could do is check.
42 [*Student:*] Yeah, I will . . . I'm gonna get in on that.
43 [*Counselor:*] Would you . . . Please do that because the sooner you know, the easier it's gonna be for you to make a decision as to whether you wannta continue here and get that two year A.A. or whether . . . you know . . . you're planning on transferring to [name of University].
44 [*Student:*] Oh oh oh, umn excuse me I thought you meant after, you know, my two years are done here, then go to [name of University]. I wanna get my degree here first.
45 [*Counselor:*] You definitely wanna get your . . .
     [*Student:*] Yeah.
46 [*Counselor:*] Right, make sure though, that if you . . . you plan on going on in

data processing, that it will be worth your while to stay here. See there's the key.

The counselor obviously interacted with these two students differently, employing two different strategies for describing the educational maze lying between these students and their future goals. With the first student, he began at the student's goal, which lay somewhere in the distant future. Working back to the present, he successively closed doors or laid obstacles in the student's path to a counseling career, explaining that the first thing the student needed was state certification and a master's degree (first transcript, line 43). This is not, however, a first requisite in a temporal sequence, it is a last. The information that the student needed first was a list of courses that he should take the following term. They would be necessary for transfer to a four-year college in order to obtain a degree that would eventually lead to a counseling position. Instead of providing this information, the counselor employed vague terms like "state teacher's certification" and "master's degree." For the junior-college student, these goals must have seemed very far in the future and thus far removed from his current experience. Without the knowledge of what he must do now to become a counselor, this student could find his options closed in the future.

With the second student, the counselor's strategy was very different. He told the student to be careful in choosing his courses and to be sure that the four-year college would accept them. The counselor began with the present and continued into the near future (second transcript, line 35), successively opening imaginary doors for the student until the future goal was reached. He treated the student's career in immediate terms, identifying the course of action that would lead from the present to the future goal. As a result of these strategies, these students' mobility within the junior college and, we can assume, their access to career opportunities after junior college, was affected.

Erickson and Shultz found that counselors routinely inquired into students' course grades and degree requirements. During the course of counseling interviews, more personal information about students also emerged. The academic information interacted with more personal information to produce differences in counseling treatments, and hence in students' careers. The establishment of "particularistic co-membership" was especially important in this regard. Erickson and Shultz found that counseling proceeded differently when students and counselors discovered similarities in backgrounds and interests during the course of an interview than when students and

counselors stuck only to academic (i.e., universalistic) information. Those students who had established a high degree of particularistic co-membership were more likely to receive positive counseling, rule bending, and extra help than those students who interacted on a universalistic basis.

In discerning the occurrence of this smooth interactional synchrony, Erickson and Shultz are uncovering an aspect of the machinery that contributes to the assembly of successful counseling sessions. Significantly, this is an interactional machinery, not a simple transmission or conveyor belt, and the grist for it is not simply students' characteristics, including their social-class backgrounds; nor is it individual effort and hard work. It is a far-ranging set of circumstances connected to organizational exigencies.

SUMMARY

These ethnographic studies provide evidence that the school plays an active role in the lives of students. Students do not simply present themselves at the door of vocational-training, special-education, or college-prep classrooms. They must engage in certain behavior that educators can interpret as evidence, and then label with designations such as "retarded," "gifted," or "college bound." The routine educational practices of ability grouping, tracking, and advising about future plans have effects on students' careers, constraining students' access to certain educational plans and programs that in turn constrain access to careers and other possibilities after the students complete school.

In and of themselves, these ethnographic studies do not provide the crucial evidence needed to decide among the competing theories of stratification. They do, however, reveal some of the ways in which everyday school bureaucratic practices, whether intentionally or unintentionally, function to sort and stratify students. In doing so, they show us how stratification processes operate in schools. More importantly, perhaps, these studies alert us to some of the socially organized, generative mechanisms that mediate the relationship between people's background characteristics, their educational achievement, and the statuses they attain.

Students' career options are not a simple function of background characteristics (as the status-transmission perspective emphasizes), nor are they the automatic and direct result of their talent, hard work, or effort (as the channel-of-mobility perspective emphasizes). Instead, those options emerge from a continuous interaction between

the child's inherited or developed capacities, the early socialization that precedes schooling, the child's ability to convert cultural capital into skills or behavior that become the basis of interpretation by teachers, testers, and counselors (Cicourel and Mehan, 1984).

As a result of such findings, it seems prudent to inquire further into the mechanisms of social stratification. This will move us away from simple, correlational models of background variables and attained status and toward models that include descriptions of the processes of stratification.

THE ETHNOGRAPHIC CONTEXT
OF THE STUDY

The way in which schools make a difference in the lives of the students who attend them is shaped largely by the placement of those students in a variety of educational programs. It had been our intent to examine the impact by studying the decision making associated with the placement of students into a variety of educational programs. "The Education for All Handicapped Students Act" (Public Law 94-142), which was enacted just as our study was beginning, led us to change our focus from general educational decision making to the specific "referral process" as now mandated by law. This coincidence (like so many other serendipitous events in social science research) turned out to be fortuitous. It provided us with a unique opportunity to see how a local agency implemented a recently enacted federal law (cf. Attewell and Gerstein, 1979). This law is particularly important, sociologically speaking, as it seems to have been informed by social science research on "labeling," especially by the stigmatizing effects of mislabeling (Goffman, 1963; Mercer, 1974). The law is important also because its provisions are so specific—defining, for example, the population to be served, and the components and temporal parameters of the placement process, in great detail.

THE SETTING

The study is situated in the "Coast District," in a small West Coast town with approximately 26,000–27,000 residents. It is located about 40 miles from a large Southern California metropolitan area, separated from the city by a number of other small coastal towns. Eco-

nomic production is nonindustrial; most of the town's income comes from tourism, local but limited agricultural business, and a multitude of small entrepreneurial shops selling clothing, foods, books, and surfing materials. The central area has several large shopping centers, especially in New Town, while in the older section primarily small shops remain. The population has increased by about 50 percent in the past ten years, with most of the growth occurring in the last five years because of the construction of several new housing developments. The ethnic distribution is approximately 70 percent white and 30 percent black and Mexican-American.

The community as a whole is fairly affluent: the median income in 1978 was $18,815; 63 percent of the working people earn more than $15,000 a year. In 1970 incomes were skewed in the opposite direction: 58 percent made $10,000 or less annually. One explanation offered for this change is that families with higher incomes have moved to New Town, which is a higher-cost area, and other financially secure people have also bought land in Old Town, principally along the cliffs overlooking the ocean. The unused land was bought from those who were unable to meet the increasingly high tax demands of the area. More and more local and out-of-town business speculators have been buying property and establishing themselves. A few years ago proposals were approved for redeveloping the main street in the old part of town, with a walk-in mall. The redevelopment was aimed at business; no housing was included in the plan. The mall was completed in 1983.

About twelve years ago a major interstate highway was built. Old Town's businesses went downhill, in the words of one resident, because traffic was rerouted to giant shopping centers that not only received the business historically provided by local stores, but could also afford to sell products at lower prices than the small Old Town shops. Recent attempts to encourage increased travel on the old highway have helped slightly, says a resident, but "it will never be the same again." Virtually no building or changes have occurred in the old section of town. The recent walk-in mall proposal is the first attempt to deal with dying business in Old Town. Residential organization, by contrast, has changed radically. Several new housing tracts have been built in the last five years, accounting for the mushrooming population. Similar patterns are occurring in surrounding communities. Ten years ago, vast areas of land supported farms that produced and exported beans, corn, tomatoes, avocados, and flowers, but agricultural production has been reduced to tomatoes, avocados, and flowers; real-

estate ventures and fashionable commodity shops have become the new attractions.

The New Town residents are basically young, professional, and upwardly mobile members of the middle and upper-middle classes, employed predominantly in technical and professional fields. Since New Town is an expensive area in which to buy or rent homes, there is a relatively high turnover among residents, many of whom regard these highly priced houses not as permanent, but as stepping stones to bigger and better homes. Old Town residents continue to be farmers, small shop owners, flower growers, blue-collar workers, and surfers.

The personality of Old Town, says a resident, has not changed significantly despite contemporary business maneuvers. Surfers, longtime residents, flower growers, and small farmers continue to reside in the older parts of town, but their number has been reduced and cloistered by the effect of the newer shopping areas. There are a number of fashionable specialty shops in the old areas that "come and go," one resident explains, because of the competition. Also, the increasing tax base forces many small shop owners to sell out. Nonetheless, a number of restaurants, ranging from "greasy spoon" to international cuisine, persist. Surf shops have done the best business by far, as has been the case for the last thirty years. Together, surfers, naturalists, farmers, hippies, entrepreneurial businesses, and religious groups coexist fairly peacefully in Old Town.

A major political issue is growth, and water. A coastal commission, presumably organized and directed by residents with interests in preserving the coastal environment and organization of life in the area, is a constant source of contention and false promises. Large-scale leveling of land for condominium construction persists despite protests. From one resident's point of view the Coastal Commission claims to want to stop rapid unplanned growth but has, to date, fared poorly in achieving this goal. This, she believes, is because members of the group are bought off by big developers and speculators wealthy enough to buy their interests. In addition, developers willing to pay excessive prices force the tax base up, and then wait until the small owners fold.

Thirty years ago this community had one elementary, one junior-high, and one high school, each with its own principal. At the time this study began, there were five elementary schools, three of which are the direct consequence of the condominium/apartment construction of New Town over the previous five years. A sixth school opened two years ago, also a direct result of new construction. The elementary school system serves the entire district with which this town is

situated. Enrollment in the district is about 2,800. The school system is governed by a superintendent who is responsible to a local board of five elected members which in turn reports to a county board and a State Board of Education.*

Public Law and Special Education

Under normal circumstances, students progress through school in a regular sequence, entering in the kindergarten and at the end of each year being promoted to the next higher grade. Under unusual circumstances, however, students may be removed from their regular classrooms during the school year and placed in a variety of special education programs, a long-standing feature in United States public schools. Recent federal legislation (PL 94-142) has formalized the procedures for placing students in these special career paths, in an effort to integrate handicapped students into the mainstream of American life. The act mandates a free and appropriate public education for all handicapped children between the ages of 3 and 21 and sets up a system of federal financial support to states that implement the law. Funds are supplied to each school system for each child who is enrolled in a special education program, until the number of students reaches 12 percent of the school population, after which no funds are available.

The major purpose of PL 94-142 is "to assure that all handicapped children have available to them . . . a free appropriate public education which emphasizes special education and related services designed to meet their unique needs" (Sec. 601[c]). The definition of an appropriate education for a handicapped child is embedded in the six leading principles of the act: zero reject, nondiscriminatory evaluation, individualized education programs, least-restrictive environment, due process, and parental participation.

The principle of zero reject prescribes that all handicapped children be given a free, appropriate public education. The law defines an appropriate education as "special education and related services which (A) have been provided at public expense, under public supervision and direction, and without charge, (B) meet the standards of the State educational agency, (C) include an appropriate preschool, elementary, or secondary school education in the State involved, and (D) are provided in conformity with the individualized education program required under section 614(a)(5)" (Sec. 602[18]). The means for implementing the zero reject principle are provided by a "child find"

program that operates on an annual basis to locate, identify, and evaluate all handicapped children who live in the jurisdiction of the public school.

Prior to any special education placement decision, the child to be referred must undergo a full individual evaluation, defined as "procedures used . . . to determine whether a child is handicapped and the nature and extent of the special education and related services that the child needs. They [do] not include basic tests administered to or procedures used with all children in a school, grade, or class" (Federal Register, Aug. 23, 1977, p. 42494).

The Federal Register stipulates that certain standards must be maintained to insure the nondiscriminatory evaluation of children with suspected disabilities:

(a) Tests and other evaluation materials: (1) Are provided and administered in the child's native language or other mode of communication, unless it is clearly not feasible to do so; (2) Have been validated for the specific purpose for which they are used; and (3) Are administered by trained personnel in conformance with the instructions provided by their producer; (b) Tests and other evaluation materials include those tailored to assess specific areas of educational need and not merely those which are designed to provide a single general intelligence quotient; (c) Tests are selected and administered so as best to assure that when a test is administered to a child with impaired sensory, manual, or speaking skills, the test results accurately reflect the child's aptitude or achievement level or whatever other factors the test purports to measure, rather than reflecting the child's impaired sensory, manual, or speaking skills (except where those skills are the factors which the test purports to measure); (d) No single procedure is used as the sole criterion for determining an appropriate educational program for a child; and (e) The evaluation is made by a multidisciplinary team or group of persons, including at least one teacher or other specialist with knowledge in the area of suspected disability; (f) The child is assessed in all areas related to the suspected disability, including, where appropriate, health, vision, hearing, social and emotional status, general intelligence, academic performance, communicative status, and motor abilities. [Ibid., pp. 42496–97]

This policy ensures careful documentation from a variety of sources, including psychological and educational tests, teacher and nurse advisements, and knowledge about the cultural or social background of a child under consideration for special education placement.

Following the interpretation of evaluation data and identification of a handicapped child, the individualized education plan (IEP) is developed by a multidisciplinary team in order to ensure the legislative in-

tent that all handicapped students' individual needs are met. The leading principles of PL 94-142 are interdependent, yet all six must be considered in the process of developing and implementing the IEP. For the purpose of revision, IEP's are reviewed at least once a year. The constituent features of each IEP are: (1) documentation of the student's current level of educational performance; (2) annual goals or attainments expected by the end of the school year; (3) short-term objectives, stated in instructional terms, that are the intermediate steps leading to the mastery of annual goals; (4) documentation of the special education and related services that will be provided; (5) an indication of the extent of time a child will participate in the regular education program; (6) projected dates for initiating services and the anticipated duration of services; (7) evaluation procedures and schedules for determining mastery of short-term objectives at least on an annual basis.

It is the public agency's responsibility to develop the IEP, even if an appropriate program is not available for the handicapped child residing in its jurisdiction. Further, a representative from the private (special or residential) school must participate at the evaluation and placement meeting where the IEP is written.

As far as possible, the placement of children should be in the least restrictive environment, that is, handicapped children should be educated with nonhandicapped children. While the preference within the law is toward less restricted placements, precaution has to be taken when moving a student through the different levels of educational services to ensure that handicapped children are not harmed emotionally by their placements.

PL 94-142 sets forth specific protective safeguards pertaining to the rights and responsibilities of parents. Briefly, these rights and responsibilities involve the following: (1) If agreement cannot be reached about the appropriate placement or IEP for a handicapped child, then parents or educators could initiate an impartial due process hearing, to ensure the fairness of educational decisions affecting students' careers and the accountability of those persons making the decisions. (2) Parents must have access to all educational records and information pertaining to the school's evaluation of their child (including testing data). (3) Parental participation (direct and indirect) is secured by their involvement in the development of education policy (e.g., permission to conduct assessments and attendance at evaluation and placement-decision meetings). (4) Parents or guardians must receive written notice (in their native language) whenever the school agency

proposes a change in the identification, assessment, or educational placement of their child.

The Referral System

In order to describe the decision-making process involved when students are considered for placement in one of a number of special education programs, or are retained in the regular classroom, we followed the progress of students' cases through the special education referral system mandated by PL 94-142. Our depiction of the referral system operating in the Coast District at the time of our study is found in Figure 2. A given case has the potential of progressing through a number of major decision-making points: referral, consideration, appraisal, assessment, reappraisal, evaluation, and placement.

In the following paragraphs we describe the activities associated with each of these key decision-making points. We also describe the variety of students' educational careers that results as their cases travel different paths, and at different rates, through the referral system, on the basis of a recommendtion from a teacher, principal, or parent. Students are referred for a host of reasons, including unusual academic performance, need for discipline because of misconduct, physical handicaps, or behavioral problems, and their cases are resolved at different points in the system (e.g., after appraisal, after assessment, in the placement committee).

Although most cases are duly forwarded by the principal to a "School Appraisal Team" (SAT), some may never get any further than the office logbook for a variety of reasons (the family moves out of the district), or it may be forwarded to the committee but not considered because of a backlog of work. The consequence of any of these circumstances is that the student stays in the regular education classroom. This is career path 1: "SAT never considers case." The SAT is a school-based committee composed of the principal, the teacher of the referred student, a special education teacher, and a psychologist from the district office. The person making the referral, most often the classroom teacher, presents the case to the SAT, whose purpose is to appraise the merits of the case. After hearing the evidence, the committee could exercise a number of options. It could conclude that the referral was not warranted, closing the case by taking no further action; the referred student is then retained (or just remains) in the regular education classroom. This "no assessment recommended" option is career path 2 in Figure 2. If the SAT concludes that the referral is warranted, it recommends assessment by the school psychologist and/or the special education teacher, or by another professional in the

case of speech, hearing, or other physical problems. This action keeps the case open and in the system.

According to the law, a parent or guardian of the referred child is supposed to be notified once a decision to give an intelligence test is reached or a psychologist works with the child on a one-to-one basis. The referral process was often interrupted at this point, when, for example, parents refused to give permission for testing, disagreed with the decision to refer, or when records from another educational institution were not obtained. When the process is interrupted, students stay in the regular classroom, as indicated by career path 3.

"Assessment" involves psychological and educational tests, home and classroom visits, and consultations with parents and teachers. The results of those examinations and consultations were returned to the SAT for further discussion. The committee had two major options at this reappraisal point: it could refer the case to a district-wide committee, or it could take no further action. If it took no further action, the child stayed in the regular classroom. This option is identified as "no evaluation recommended" (career path 5). A variation on this option involved direct placement (career path 4). Under certain circumstances, the SAT placed students into particular educational programs without going through the normal evaluation phase of the program (to be described below). Once again, the referral process could be interrupted at this point, and students would be retained in their classrooms (see career path 6).

Final placement decisions were made by the "Eligibility and Placement (E&P) Committee," a districtwide multidisciplinary team composed of the student's parents, the school administrator in charge of special education, the school nurse, the district psychologist who was carrying the case, the classroom teacher who made the referral, and a special education teacher who would potentially receive the referred student. The E&P Committee had two main options: recommend placement or not recommend placement. The "no placement recommended" decision retains the student in the regular classroom (career path 7). If the committee recommends a special education placement, it has a number of possibilities available, as shown in the "placement" column in Figure 2.

RESEARCH METHODOLOGY AND ITS THEORETICAL UNDERPINNINGS

The overall research strategy of this project has been to follow the progress of students' careers through this decision-making system. Contributing to the continuing dialogue among researchers in the

Process interrupted;
student stays in
classroom

3

Yes | But   Yes | But

Regular
education
classroom

Referral
to SAT
?   Yes

SAT
considers
referral
?   Yes

SAT
recommends
assessment
?   Yes

Assessment
conducted
?

No   No   No

Student stays in
regular classroom

SAT doesn't consider
referral; student
stays in regular
classroom

1

No assessment
recommended (NAR);
student stays in
regular classroom

2

5

Fig. 2. The referral process in the Coast District

6

8

Yes | But

Yes | But

9 | Educationally handicapped

Yes | SAT recommends evaluation ? | Yes

10 | Learning disabilities group

E&P recommends placement, writes IEP ? | Yes

11 | Severe language handicap

No | No

No

12 | Multiple handicap

13 | Speech therapy

Direct placement

14 | Off-campus placement

4

No evaluation recommended (NER); student returns to regular classroom

Counseling

Reading

7

No placement recommended (NPR); student returns to regular classroom

Adaptive physical education

Bilingual education

No. | Career path

Beginning or end points; classrooms or programs

Decision-making juncture ?

Description of decision making at that juncture

Direction of student's movement through the system

Process interrupted: referral withdrawn or held pending owing to such circumstances as family move from district, parent refusal of referral, student illness

SAT   School Appraisal Team

E&P   Eligibility and Placement

IEP   individualized education plan

ethnographic tradition, broadly conceived, our study has been guided by techniques developed in "micro" or "constitutive" ethnography. The scope and definition of ethnography has varied considerably, and opinions and practice differ on many details (see, for example, Sanday, 1979; Erickson and Shultz, 1982; Hymes, 1980, 1982; Heath, 1982). These debates spurred us to reexamine many aspects of ethnographic research and have led us, like others, to go beyond an uncritical narrative of cultural detail and to focus on a deeper analysis of our recorded observations. Research, after all, is re-search, a statement about the reflections of our searches.

We are pressing for an ethnographically informed theory concerned with the wider educational and sociopolitical context of the classroom and the school. Microethnography has been associated with the fine-grained analysis of the minute details of face-to-face interaction in a small number of educational events. This association developed in part, we are sure, because microethnographers—as they were developing their theories, refining their research techniques, and acclimating educators, students, and parents to the use of audiovisual equipment—concentrated on a small number of events. For the most part, the social organization of an event within one educational setting was described separately from events in other educational settings within the school, or without comparing events inside and outside of school. This methodological stance has been subject to criticism: some observers (e.g., Giroux, 1981) have maintained that interpretive accounts lack an adequate notion of either institutions or society, while others (e.g., Gilmore and Smith, 1982) have concluded that the lack of attention to a wider social context dooms microethnographic work to impotency in its search for answers to school success and failure.

Microethnography, it must be pointed out, is not just a research technique. It is informed by a theory (Erickson and Shultz, 1982; Mehan, 1978, 1979, 1984; McDermott et al., 1978). The theory is concerned with the ways in which the enduring and stable features of our everyday lives are assembled in social interaction. One place where these interactional processes can be located within the educational realm is in face-to-face encounters, for example, between teachers and students. In addition, social structures are assembled when educators work autonomously, filling out forms, writing reports, or working in committee on a textual or documentary representation of previous face-to-face encounters. An underlying goal here is to demonstrate that the interactional (i.e., mutually constitutive) theory informing microethnography has application across situations and in broader contexts.

In order to describe how we are linking the structuring of inter-action that unfolds in face-to-face and person-to-text encounters with the broader educational and sociopolitical context, it may be helpful to borrow a popular metaphor. We started with a wide-angle lens, "zooming in" on microcontexts (classrooms, testing sessions, commit-tee meetings), and progressively focused on the setting in order to capture the most salient features. Then, to avoid editing out the larger sociopolitical and educational issues, we zoomed back out into the larger context, carrying with us those insights that we had gained from our examination of microcontextual features.

Research, in its rush to the classroom, has sometimes been guilty of premature closure and "tunnel vision." The advanced audiovisual re-cordings gathered by ethnographic researchers are not themselves data, but rather heuristic and exploratory devices. We can't claim to account equally for every aspect of school life in our analysis. While following referrals, however, we do not attempt to manipulate, con-trol, or eliminate (and thereby miss out on) aspects of this complex totality. Instead, we have tried to systematize our work in order to give more concentrated attention to the emerging issues.

Data Gathering

We employed many research strategies to follow students' careers through the referral system: reviewing official school records, ob-serving daily educational practice, videotaping key decision-making events, and interviewing a number of school personnel.

The records of all 2,700 students in the district were reviewed. These records provided such baseline data as the age, sex, and grade of students, the official reason for referral, the name of the person who made the referral, the date of referral, psychological-assessment information, educational-test results, dates of test administration, and final disposition of referrals. Information available from school rec-ords was checked against information that became available to us through observation, informal discussions, and more formal inter-views with educators in the district.

After a referral was made, we invited the classroom teacher to par-ticipate in the study. Of 58 teachers who were contacted, 31 agreed to participate. We then observed in each classroom in order to gain a sense of routines and typical patterns of classroom life. Without knowing the identity of the referral student, one member of the re-search team observed and took notes. The resulting accounts in-cluded descriptions of moment-to-moment details, while focusing on the scene as a whole; a map of the physical arrangement of the room;

the daily class schedule; a list of all students, with a breakdown by gender, ethnicity, and ability-grouping.

Once general observations were complete, representative classroom events were videotaped (see Erickson and Shultz, 1982, and Cook-Gumperz and Gumperz, 1982, for a discussion of the selection of key events for more detailed analysis). One or two events, each approximately 30 minutes long, were recorded with Sony half-inch portable studio equipment. The equipment was set up in a corner of the classroom at a time when students and teacher were not present—usually before school or during recess, and the microphone cable was stretched as inconspicuously as possible across the floor or the ceiling. Researchers who have recorded classroom interaction on a regular basis have reported that participants acclimatize to the presence of video equipment. Although we could record only once or twice—too infrequently to allow participants to disregard the equipment completely, teachers usually reported that recording was unobtrusive and did not produce atypical classroom behavior.

In order to capture what the video lens often cannot, we obtained copies of the educational materials in use during the event taped and copied all information from chalkboards. This information proved especially important during subsequent viewing sessions, especially with the teachers, when we were able to refer to materials that were not visible on tape.

If parents and school psychologists agreed to participate in the study, cases referred by the School Appraisal Team to the school psychologist for assessment became topics of further investigation. Educational testing was conducted at each of the school sites by school psychologists. Since they did not have offices at the schools, testing took place in offices shared with nurses, speech therapists, and other specialists. Confined and crowded work areas such as these posed a problem for psychologists who sought privacy for test administration. These arrangements also posed problems for the research team, as we wanted to work from unobtrusive taping positions.

The school psychologists requested that all taping of testing sessions be conducted by the project director personally. One of the psychologists allowed the project director to remain in the room during testing; the other requested that he set up equipment, leave during testing, and return after testing was completed. To accommodate the preferences of the first psychologist, the director set up the equipment and then retreated to a small work space in a corner of the room in order to take notes about the session. The psychologist explained

to the students that the "man was in the room to do some work," an account that seemed to satisfy them. The presence of an outsider did not seem to disturb either tester or student. To accommodate the preferences of the second psychologist, the project director set up equipment, demonstrated its use to the psychologist (in the event that she wished to stop the tape—an option provided in the human-subjects-consent agreement—or if the machine malfunctioned) and left the room. This psychologist timed breaks in the testing routine to coincide with the length of a tape. During breaks, tape was changed and portions of it were often played back to satisfy the curiosity of students.

According to the provisions of the human-subjects agreement, the psychologists had the option of canceling a videotaping session before or during taping; they could also have the tape of any session erased after its completion. Two sessions were canceled on the day of testing; none were stopped in progress; and the psychologists did not ask to have any tape erased. This suggests that the videotaping process proceeds smoothly if the initial barrier against taping sensitive events can be overcome.

If the SAT found a case warranted and forwarded it to the Eligibility and Placement Committee, then we asked committee members for permission to observe and videotape committee-meeting proceedings, which were conducted in the conference room at the district office. They were scheduled to last for an hour. We set up the camera in the committee room in advance of the session scheduled for a student in our sample, and placed the video recorder outside the room. The equipment was turned on and left running. Often a member of the research team also sat in on the meeting. Recording these decision-making sessions proved to be a delicate issue. Three taping sessions were canceled by participants immediately before taping, even though the educators themselves had agreed to participate in the research. The impact of human-subjects considerations on a project of this sort cannot be minimized. The issue of participants' consent to cooperate in social science research is a topic that requires the serious attention of federal agencies, researchers, and participants in research.

The videotape gathered from classrooms, testing sessions, and committee meetings served as a multipurpose document for interviews with participants in these key decision-making events. First, it gave us firsthand access to the participants' reports or opinions of the taping sessions. Second, it enabled us to investigate, in an informal and relaxed manner, their general notions about the educational institution,

the referral system, and the particular referral case. Third, and per-
haps most important, it provided us with an opportunity to corrobo-
rate our observations about events on tape and on more general activi-
ties within the school district.

With few exceptions, the interviews had two major parts. One part,
which we call the "context analysis," covered a wide range of topics,
i.e., optimal class size, curriculum, the special education referral pro-
cess, children who are referred, and the research process; it was con-
ducted in open-ended question-answer format (see Chapter 5 for
more detailed information). The second part, the "analysis of edu-
cators' accounts" (see Chapter 8), centered around the educators'
viewing of and commentary on the videotape of the events in which
they were involved. This part of the interview is unique in its use of
videotape as a document of educator-student interaction. We can ob-
tain educators' reports about events in which referral children were
engaged as well as their indication of the typicality of the occurrences
we had videotaped.

SUMMARY

The special education referral system in the Coast District can be
conceptualized as embedded within a series of concentric circles.
Each circle represents aspects of the social, educational, political, and
legal environments in which interaction among educators and be-
tween educators and students takes place. Our research design led us
to gather data on these contexts surrounding the referral system. Dif-
ferent contexts required different data-gathering techniques. As a con-
sequence, information obtained by using a number of particular
research procedures informed our understanding of each context.
Hence, we analyzed school documents and records, observed behav-
ior, interviewed key participants, and analyzed the discourse in im-
portant phases of the referral process.

We paid particular attention to three key phases in the referral pro-
cess. We obtained a behavioral record (videotape) of the interaction
between the participants involved in the classroom, assessment, and
committee portions of the process. We matched the behavioral record
with an account of the event provided by at least one of the partici-
pants in the event. This set of materials facilitates a number of analy-
ses, both within and between events (see Figure 3). The interaction
between participants is available for analysis *within* a given event. In
addition, as a student's case proceeds through the referral system, we
have compared the behavioral record *between* events. Thus we can see

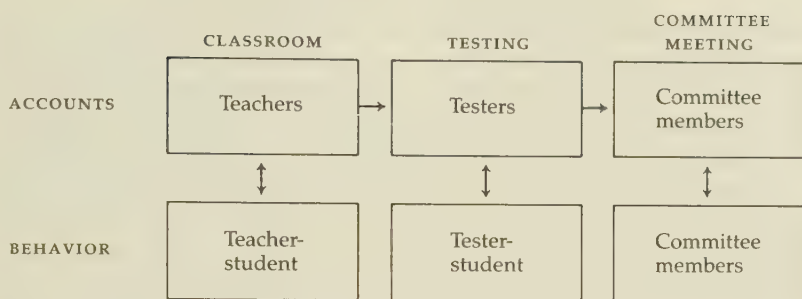|	CLASSROOM	TESTING	COMMITTEE MEETING
ACCOUNTS	Teachers	Testers	Committee members
BEHAVIOR	Teacher-student	Tester-student	Committee members

Fig. 3. Accounts and behavior at key decision-making junctures

how the student's behavior in the classroom compares with that in the testing situation, and how the discourse representations from classroom interaction compare with textual representations of the student's behavior as presented in the placement committee meeting.

Similar points of comparison are available from educators' accounts obtained during our viewing sessions. We compare teachers' accounts about students' classroom performance with psychologists' reports about students' testing performance and with reports about students generated in committee meetings. Thus, the structure of accounts generated from a particular phase of the referral process can be analyzed, as can the structure of accounts generated by the same person on different occasions (e.g., a classroom teacher while watching a classroom tape and while watching a committee-meeting tape).

The conduct of research in the sociology of education contains dualisms that have long been present in Western scientific thinking. We retained elements of this dichotomous way of thinking as we presented our brief overview of the status-attainment literature. We employed a number of apparently mutually exclusive categories: "schools make a difference" / "schools don't make a difference"; "schools are active" / "schools are passive"; "research inside schools" / "research outside schools." Each of these dualisms is a consequence of a more general formulation that has been with us for as long as sociology has been a discipline: the distinction between "macro" and "micro" sociology (cf. Cicourel and Knorr-Cetina, 1981). In the former, social structure is treated as a facticity, a given, a stable entity, with interaction relegated to the status of a transparent medium through which the external world is reported and analyzed (Gusfield, 1981: 83). In the latter, insofar as it is said to exist, structure is treated as a feature

that emerges and recedes during the course of interactional encounters; interaction is the stuff from which structure is made. It has seldom been the case, however, that either of these approaches includes its opposite in the foundation of analytic designs. Recognizing that "the core of the problem is to link [inter]action and structure without reducing one to the other" (DiTomaso, 1982: 15), it is our purpose to begin an outline by which this macro/micro dualism can be collapsed, and the truth in each can be realized.

Parsons (1959), Dreeben (1968), and other theorists who see schools facilitating social mobility suggest a positive relationship between school and status attainment. In their presentations social class, scholastic achievement, and status-attainment are depicted as static slots in the social order. In so doing the authors accept uncritically the facticity of each construct and the meaning of the connection between the two. Bowles and Gintis (and to a lesser extent, Coleman et al., 1966, and Jencks et al., 1972) also acknowledge a relationship between school and status-attainment, at the same time criticizing the noticeable fact of inequality in society. However, they decontextualize the connection in their unidirectional causal argument that social-class background predetermines in-school and after-school experiences to such an extent that no amount of pedagogic change can alter its influence.

Collins and, to varying degrees, Bernstein (1973, 1981) and Bourdieu and Passeron (1977), accept the Weberian formulation of society as a multitude of individual status groups in perpetual competition for wealth, status, and power. In the educational realm, this view of the relationship between schooling and status-attainment means that credentials are commodities bought on the market by anyone solvent enough to participate. The possession of such commodities determines attained occupational success. In such formulations, not only credentials, but also wealth and status, are treated as commodities, i.e., objects or things. In short, each of these theorists acknowledges a "school and status attainment" relationship, but none of them explicitly expresses the substantive manner in which so-called macrostructural forms are realized in interaction (for a shift in this direction, see Cicourel and Knorr-Cetina, 1981). We must do more than appeal to factors such as social–class background characteristics of students or the structure of class relationships in society when making claims about the consequences of schooling for students' careers. As a first step in collapsing the social structure/social interaction dualism, we

recommend showing how these factors actually operate in the arena of schooling and are worked out in the day-to-day activities of educators with students.

Researchers who have focused on various forms of face-to-face interaction in schools have indeed been somewhat successful in demonstrating that schools are not simply passive vehicles through which students make their way en route to predetermined positions in the social order, but the exuberance of this position can have unfortunate, if unintended, consequences. Microethnographic studies have included such statements as: "classroom events are assembled in the interaction among the participants"; "educational test results emerge in the interaction between tester and student"; "students' identities are interactionally constructed." While calling into question the static and stable conceptions of structural elements, such statements leave room for the conclusion that social structures are entirely local productions, emerging solely within the immediate circumstances of social situations. This formulation implies that factors that originate outside particular events—social class or politico-economic forces—are not significant in the assembly of students' careers, or in the life of the school itself. Furthermore, concentrating on the knowledge required for participation in the culture of the classroom can lead to the interpretation that events there are independent of events in the rest of the school, and the school independent of the rest of society.

A second step in collapsing the structure/interaction dualism involves insuring that school and classroom sub-units are not treated as autonomous configurations. Classrooms and other organizational units of the school are influenced by the bureaucratic institution of the school and the society of which the school is a part. Administrative policy concerning curriculum content, textbook choices, teaching methods, and testing practices are established by school boards and state departments of education at an organizational level above the classroom. The decisions made at higher levels of bureaucracy impinge upon educational practice in the classroom. Likewise, the demands of the economy for a technically trained, literate, and compliant labor force make the school responsive to external forces. Furthermore, parents exercise their prerogative of voicing opinions about what and how their children should be educated and what topics should be taught.

It is this very connection between schooling and society that must become a stronger focus of investigation. If, in fact, schools provide all children with equal opportunity to acquire cognitive skills as the

channel-of-mobility status-attainment perspective provides, then the organization of instruction and the presentation of curriculum should reflect these processes. If, however, there is a correspondence between the organization of society and the organization of schooling, as Bowles and Gintis (1976) suggest, then we must begin to search for the interactional mechanisms that recapitulate the structure of class relations in the structure of educator-pupil interaction (Wilcox, 1982). If, in fact, schooling is the acquisition and transmission of specific cultural practices and information, then "what counts as knowledge" in the school system and how the specific institutions of schooling, including the workings of the curriculum, are organizing to transmit this cultural capital across generations must become a subject of inquiry. Finally, if the social facts of education are constructed in the interaction within the context of a particular educational encounter, as microethnographers say, then we must show the connections between interactional contexts, political arrangements, and community relations (Ogbu, private communication).

The research that follows is occasioned by this line of thinking and by the realization that the connections between micro and macro—social structure and social interaction—are not simple, technical relations. Instead, they are practical actions, performed by humans, which implies actions informed by interests (Habermas, 1970). When we realize that social structure is both a product and a process of human activity, then the questions become: whose human activity? for what purpose? And we begin to ask: What spirit defines, shapes, and controls the conditions of human activity? These are the kinds of questions that neither a structural nor an interactional theory alone can answer. It is our research goal to try and synthesize these perspectives in order to learn about the construction of social stratification, and to locate the stratifying in the interactional processes of the everyday lives of people.

CONSTRAINTS ON EDUCATIONAL DECISION MAKING

We now begin to follow the progress of student careers through the referral system. In the course of this investigation of decision making, it became evident that a number of factors constraining the rationality of the referral process merit attention.

THE DISTRIBUTION OF STUDENT REFERRALS

A total of 157 cases were processed through the referral system during the 1978–79 school year. Of this number, 141 were first-time referrals; the others were referrals from special education teachers suggesting that students were ready to be returned to regular classrooms, or recommending that a modification in their individualized assessment plan was in order. Our analysis will be confined to 140 of the first-time referrals because one case lacked sufficient information for tabulation.

The classroom teacher was listed in the school records as the person making each of the 141 referrals. We must not confuse the referral agent of official record with the people involved in the decision to refer. We could not determine the number of times parents and teachers, or principals and teachers, conferred before the teacher filled out the official referral forms. The average enrollment in the Coast District during the time of our study was 2,781. Five percent of the students in the district, then, were referred during the school year in which data were gathered.

The various career paths through the referral system were described in Chapter 3 (see especially Figure 2); the number of students or, rather, students' cases that traversed these paths is summarized here

in Table 1. The most traveled path is from the classroom through referral, appraisal, assessment, and placement into a learning disabilities program. A total of 36 students (25.7 percent of referred students) were placed in this program. The LD Group, as it is sometimes called, is a "pullout program," in which students spend part of their day in their "home classroom" and part in a special education classroom.

The next most-represented educational decision (28 cases: 20 percent) is career path 5, "no evaluation recommended." A student achieves this educational designation when his or her referral is considered by the School Appraisal Team; educational assessment is recommended and conducted, but upon reappraisal of the case there seems to be insufficient reason to warrant its further consideration. Instead, the student remains in the regular classroom. On a significant number of cases no formal decision was reached because the referral process was interrupted for a variety of reasons. A total of 29 cases (21 percent; see career paths 3, 6, and 8) fell into this category, which has the consequence of leaving the student in the regular classroom—by default, as it were.

The final points on the career paths are similar in their consequences for students' lives. There are two main decision-outcomes generated by the system: retain in a regular educational program, or place in a special education program. A student can achieve the status of a regular education student by design, by a formal decision to keep the student in a regular classroom, or by default if the case does not produce another recommendation.

Special education programs can be grouped into "whole day," also called self-contained classrooms, and pullout programs. Self-contained classrooms are considered the more extreme placements; the least severe is "counseling," which encourages parents to seek advice from a professional psychologist outside the district.

The career paths in Table 1 are consolidated into these regular and special education placement categories in Table 2, which shows that 56 percent of the cases referred were resolved, either by design or by default, as regular education placements. The remaining 44 percent of the students were placed into one of three types of special education programs. It is interesting to note that 37 percent of the cases in the regular education category were not placements at all, but came as the result of interruptions in the referral system. The majority (66 percent) of special education cases were placed into the less severe, "pullout" programs; 24 percent of special education placements were in "self-contained" classrooms.

TABLE 1

Career Paths Through the Referral System

	Students	
Career path number / Description	No.	Pct.
1. Student referred; case never considered by SAT; student stays in classroom	1	0.7%
2. SAT considers case; no assessment recommended; student stays in classroom	19	13.6
3. Process interrupted at appraisal phase; student stays in classroom	24	17.1
4. SAT considers case at reappraisal phase; makes direct placement (adaptive P.E. = 1; bilingual = 3; reading = 1; counseling = 6)	11	7.9
5. SAT considers case; recommends assessment; assessment conducted; no evaluation recommended; student stays in classroom	28	20.0
6. Process interrupted at assessment or reappraisal phase; student stays in classroom	4	2.9
7. E&P considers case, no placement recommended; student stays in classroom	1	0.7
8. Process interrupted at evaluation phase; student stays in classroom	1	0.7
9. E&P considers case; recommends placement in educationally handicapped classroom	7	5.0
10. E&P considers case; recommends placement in learning disabilities group	36	25.7
11. E&P considers case; recommends placement in severe language handicapped classroom	3	2.1
12. E&P considers case; recommends placement in multiple handicapped classroom	2	1.4
13. E&P considers case; recommends placement in speech therapy	3	2.1
14. E&P considers case; recommends placement outside of district	0	0
TOTAL	140	99.9%

These are some of the basic facts about the results of the referral process in the Coast District during the 1978–79 school year. Turning to the referral process itself, we will examine some of the organizational circumstances responsible for the distribution of students in these educational categories. In so doing, we will be evaluating the

TABLE 2

Types of Placements

	Students	
Placement	No.	Pct.
Regular Education		
In classroom by decision	49	
In classroom because of interruption in process	29	
TOTAL	78	55.7%
Special education		
Counseling	6	
"Pullout" Program[a]	41	
"Self-contained" Programs[b]	15	
TOTAL	62	44.3%
GRAND TOTAL	140	100.0%

[a] Learning Disability Group (LDG), Speech Therapy, Reading, and Adaptive Physical Education.
[b] Educationally Handicapped (EH), Severe Language Handicap (SLH), Multiple Handicapped (MH), and Bilingual programs.

efficacy of the prevailing status-attainment theories on the influence of schooling on students' careers that we reviewed in Chapters 1 and 2.

A number of forces impinge upon the referral system and thereby influence the identification, assessment, and treatment of children who are found to be in need of special education services. Some of these constraints on educational decision making are the direct result of federal legislation. Others are the consequence of the way in which this particular district has chosen to implement that legislation. Still others are the unintended consequences of organizational arrangements within the Coast District. We collect these constraints under the heading of "practical circumstances." These circumstances are "practical" to the extent that they make their appearance day in and day out; they seem to be an inevitable part of the everyday routine of education in an institution organized in a bureaucratic way. These constraints are "circumstances" to the extent that they seem to be beyond the control of the people involved; they do not seem to be the personal responsibility of any one person. Thus, practical circumstances are the sedimentation from actions of several individuals, some of which are taken in concert, some autonomously. Some are

taken in face-to-face encounters, others are enacted with textual or documentary representations of face-to-face encounters.

The courses of action that educators take in response to practical circumstances often have significant consequences. Specifically, they contribute, through the special education referral system, to the construction of different educational career paths that, like educational tracks, lead in turn to different biographies for students. By suggesting that these practical circumstances contribute to different educational careers, we are not saying that the participants involved in this educational decision-making process necessarily plan to make educational services available to students differentially. Our daily observations, interviews, and discussions showed that educators were genuinely concerned for the welfare of students in their charge. They were not overtly trying to discriminate against any children. Nevertheless, special education services were made available differentially to students in the district. The manner in which these practical circumstances impinge upon educational decision making leads us to conclude that differential educational opportunity seems to be an unintended consequence of bureaucratic organization rather than a matter of individual or even collective intentions.

ORGANIZATIONAL CONSTRAINTS

Administrative procedures, developed to facilitate bureaucratic operations, were found to modify the very system they were intended to facilitate. There was a notable trend in the distribution of referrals in the early months of our study, with more cases than could be handled by the special education staff. Perhaps in response to the case overload, reporting practices became more formalized. In the years preceding the study and for the first part of the year that we observed in the district, the procedures for reporting referrals varied from school to school. Teachers in some schools wrote handwritten letters; in other they filled out mimeographed forms designed by the principal. As teachers became more aware of special education laws and policies and the possibilities for dealing with children who needed assistance, the number of referrals increased at the school-site level. When referrals were transferred to the district level, it soon became apparent that there were wide variations in reporting procedures and criteria.

During the late fall, the director of special education introduced a uniform reporting procedure. Referrals were to be reported on a five-page form that included a "face sheet" for information about the stu-

dent's background, age, grade, etc. The other pages were checklists of symptoms observed by the teacher in the classroom. This new referral form was distributed by the central office along with guidelines about the characteristics of children with certain learning disabilities. A series of in-service workshops on the new procedures and the defining characteristics of special education children was held in the months following the distribution of the new form. The workshops were intended to instruct teachers about the information to supply on forms and served also to inform teachers about the types of students who should be referred.

As far as we can determine, the introduction of these new procedures had countervailing influences. On the one hand it seems, based on our classroom observations and interviews with teachers, the new procedures may have flattened the upward trend in referrals—teachers complained that they were too complicated. On the other hand, the dissemination of information about the characteristics of special education students may have had a "pygmalion" or "abnormal psychology syndrome" effect on referrals. The pygmalion effect works like a self-fulfilling prophecy; the act of predicting that an event will occur organizes actions in the direction of the event such that the predicted event is made to occur. The abnormal psychology syndrome often occurs when students take courses in clinical psychology. As instructors discuss the symptoms associated with schizophrenia, neurosis, psychosis, and other disorders, students discover evidence of these disorders in their own behavior. They think they've "got" whatever it is that is being studied. In analogous fashion, teachers provided with a list of the symptoms associated with learning disabilities may now find in their students' behavior evidence of these symptoms that had previously gone unnoticed. In this way, the presentation of a category or a concept provides a means to find the behavior to collect under it. Whereas the behavior of the children should provide the impetus to search for an appropriate means to assist them, the special education category itself becomes a device to search for and collect students.

A further change in administrative procedures particularly influenced the educational opportunities of referral students. In the month of March, the school psychologists came to the conclusion that the referral system was not only overloaded, but it was "full." They had counted their case loads, plotted them against the number of weeks remaining in the school year, and determined that it was not possible to process the number of students who had already been referred by

TABLE 3

Number of Referrals, by Month

Month	Number	Month	Number
July	2	Jan.	18
Aug.	10	Feb.	19
Sept.	16	Mar.	14
Oct.	26	Apr.	13
Nov.	14	May	4
Dec.	1	June	3

the end of the year. On the basis of this information, the director of pupil personnel services circulated a memo throughout the district: principals and teachers were to refer only severe and obvious cases.

We are not proposing a simple, linear, unidirectional causal connection between these changes in administrative procedures and student outcomes because we find that the institutional arrangements of the school operate in interconnected ways. As a consequence, we are not suggesting that the introduction of new forms and the instructions to curtail referrals were the only effects on the referral process. Furthermore, because the institutional arrangements of the school are interconnected such changes are not readily apparent in statistical arrays of referrals. Nevertheless, there was an immediate and significant decline in the number of referrals throughout the district. The average number of referrals between July and March, when the new directives were issued, was thirteen a month, and for the remainder of the year an average of seven a month (Table 3). Although we cannot justify a direct causal connection between policy and referrals, the change in the rate at which students were referred for special education seems to have been influenced by changes in administrative procedures.

Changes in administrative procedures have consequences for the careers of students. Consider the case in which a teacher diagnoses a reading problem in a student during the months of September or October. That child can potentially become a special education student and receive assistance, because the district had institutional arrangements to appraise, assess, and evaluate that student during those months. Now consider the case in which that same student was not evaluated by his teacher until May or June. Because of changes in administrative procedure, it is possible that the student would not be eligible for special education assistance. There is a parallel between the

mentally retarded students in the Catholic schools in Riverside County studied by Mercer (see Chapter 2, above) and the special education students in the Coast District. It is not possible to have special education students without institutionalized practices for their recognition and treatment.

According to much of prevailing social science theory and special education law, designations like "educationally handicapped," "learning disabled," and "normal" student are reflections of the characteristics of students. As we have seen, however, such designations are influenced by the calendar and by educators' workloads. These are institutional arrangements, not individual characteristics. The influence of practical circumstances, such as responding to a crowded schedule, suggests that the place to look for educational handicaps is in the institutional arrangements of the school and not in the characteristics of individual children.

The Coast District, like other modern school districts, has established a wide variety of programs to assist students with special needs. The bilingual and special education programs were the most extensive in the district. Although these programs were designed to complement each other by helping students with different problems, we became aware that on occasion they also competed with each other. Two of the schools (Islandia and Midvale) had well-developed bilingual programs for Mexican-American and Anglo students. Participation was voluntary. Although popular among Mexican-American parents who wanted their children to learn English, the bilingual programs experienced some difficulty in recruiting students from among the Anglo population. A goal of the bilingual education faculty was to maintain an equal balance of Anglo and Mexican-American students in its classrooms. This concern had unintended consequences for the identification and assessment of special education students. Bilingual teachers reported to us that they met with resistance from their supervisors when they wished to refer Anglo students from bilingual classrooms. The reason given was that the removal of Anglo students would disrupt the ethnic balance of the bilingual program.

We have suggested that the designation "handicapped student" was influenced by calendar and workload. That designation appears to be influenced also by a student's classroom assignment. The Anglo student in a bilingual classroom does not have the same opportunity to be identified as a special student (and receive the assistance that presumably comes with that designation) as does a student assigned to a monolingual classroom. This difference in educational opportunity is

not a function of genetically endowed intelligence, cognitive styles, or social-class backgrounds. It is, rather, an unintended consequence of institutional arrangements associated with classroom assignment.

Mexican-American students in bilingual classrooms were also unlikely to be designated as special education students, but for different reasons. Previous studies have shown that ethnic-minority students are overrepresented in special education classrooms. We did not find evidence of this unequal ethnic distribution in the Coast District: the number of ethnic minority students in special education classrooms (16 percent) is almost precisely equivalent to the distribution of ethnic minority students (15 percent) in the district.

One way to account for this even distribution, especially in the light of a history of uneven ethnic distribution, we call the "Mercer effect." School districts are now well aware of social science research (and social and educational policy based on it) about the mislabeling of minority students. They have instituted procedures to serve students from different cultural backgrounds equitably.

Another explanation of this ethnic distribution is based on teachers' perceptions of the special education system. When we observed in bilingual classrooms, we were often struck by the behavior of some of the students. The problems of bilingual students who had not been referred appeared to be more serious than those of some of the students who had been referred from monolingual classrooms. The teachers acknowledged the accuracy of our observations and went on to explain that they did not refer Mexican-American students to special education programs because they did not believe that the district had adequate resources to test or assist bilingual students outside the bilingual classroom. Because of their expertise, the teachers in the bilingual programs thought they were better equipped to teach students in their own classrooms than were the special education teachers in their special classrooms (for similar findings in Illinois, cf. Moore et al., 1981: 141–42). Moore and his colleagues collect such practices under the apt expression, "the better off judgment," which operates when teachers conclude that students are "better off with me" than in special education.

We do not aim to challenge the accuracy of teachers' reports about the responsiveness of the district to bilingual students. The status of the district's facilities for those students in its special education classrooms is not the issue here. From the point of view of the teachers the quality of services for bilingual students is not a matter of fact—it is a matter of belief. The teachers believed that their students would be

better served in their classrooms than in special education classrooms. Our interest lies in the consequences of those teachers' beliefs, however, which virtually guaranteed to bilingual students a differential opportunity to be defined as special students that their monolingual contemporaries did not share.

The laws governing special education require school districts to provide educational opportunity to all students by whatever means are necessary. If facilities to educate special students are not available within the district, then the district must supply the funds necessary to educate them outside the district. In the year before this study started, two students who had multiple physical handicaps attended a special school outside the district, at district expense. A subsequent budgetary analysis determined that, for the amount of money being spent on the transportation and tuition of these children, a teacher and a portable classroom could be purchased for use within the district. Within a year, the number of students with multiple handicaps rose from two to eight.

One explanation for this sudden and dramatic increase concerns the student population: there was an increase in the number of students with more than one physical handicap in the district. That explanation defines handicaps as students' characteristics. We have come to accept an alternative explanation that defines handicaps in terms of the institutionalized practices of identifying handicapped students. There must be institutionalized arrangements for locating, assessing, and placing students in order for students to be designated as members of educational categories. Consider, for example, a student who is confined to a wheelchair. Certainly, one would argue, he is handicapped or has a handicap. However, such a student would not automatically be placed in a special education program for the physically handicapped. Institutional practices for identification and placement would have to be placed in motion in order for the student to achieve that designation. From this point of view, then, a physical handicap is the product of an institutional practice. A student cannot be physically handicapped, institutionally speaking, unless there are professional practices to make that determination.

Once a referral has been made, the case is sent first to the School Appraisal Team and then, after the psychological assessment of the student, to the Evaluation and Placement Committee. SAT and E&P committees are composed of teachers, site administrators, a number of educational specialists, and district representatives. The parents of referred children join E&P committees. A number of practical prob-

lems plagued the organization and conduct of the committees that influenced the referral process, and hence the careers of children being considered for special education.

The seemingly simple act of scheduling committee meetings for a time that was convenient for teachers, specialists, parents, and administrators, posed insurmountable problems. If meetings were held during school hours, then teachers needed to find a way to be in two places at once—the classroom and the meeting room. Some teachers arranged to attend meetings by turning their classrooms over to aides or student teachers; others tried to obtain substitute teachers. Neither solution proved to be wholly satisfactory to all concerned. Teachers who were reluctant to leave their classrooms in the hands of paraprofessionals became impatient at long committee meetings. Some of them left SAT meetings before discussions were completed, reporting frustration because the referral case was not completed and anger because regular classroom activities were disrupted. Principals were unwilling or financially unable to spend money on substitute teachers. In response to these countervailing pressures, some schools resorted to scheduling meetings before and after school. This solution was not satisfactory either, because it prolonged working days, fatigued committee members, and seemed to lead to a general malaise. Some teachers reported they just tried to get such meetings over with—an attitude that is not conducive to careful and reasoned consideration of complicated referral cases.

The problem of coordination was compounded when E & P meetings were scheduled. Because they were held at the district office, teachers and others had to travel there from the local school site. Participating parents often had to take time off from work, or to arrange for child care; some did not express an interest in special education. These factors had a negative influence on parents' attendance at meetings. In addition, teachers were often unable to attend when meetings were held to accommodate parents (e.g., during the school day) or were quickly scheduled when a baby-sitter became available. Scheduling meetings in the Coast District was especially difficult because of the year-round school calendar. Frequently the consideration of a particular case had to be postponed because one or more of the required committee members would be "off track." It often seemed that the problem was compounded because, as soon as one committee member would return, another would go off track. An information gap was created because the attendance of specialists varied from meeting to meeting.

Yet another factor complicating the scheduling of placement meetings was the itinerant status of the two school psychologists whom the district employed at the time of this study. One psychologist had two schools to service; the other had three. This workload distribution meant that they could be at certain schools only on certain days, which reduced the number of times available for meetings. This particular scheduling problem was exacerbated when one of the two psychologists left the district and the one who remained had to work in rotation among all five schools until a replacement was found.

As a consequence of scheduling problems, especially postponed meetings, decisions about referral cases were delayed; sometimes children were not placed into special education programs until five months after they had been officially referred to the SAT. Decisions were delayed so long in some instances that students were not placed until the following school year.

The itinerant status of the school psychologists also affected the amount of time it took to process cases. Each psychologist could spend only one day a week at a given school site. This scheduling limitation had a major impact on the way in which students were processed by the school psychologist and other specialists. On a typical working day, the psychologist arranged to assess a number of students at one school. She secured parents' permission to administer tests and made arrangements with teachers to remove students from classrooms. If all went well, the school psychologist might administer tests to as many as four children in one day. However, all didn't go well very often. Students were absent; a parent's permission slip was misplaced or not returned on time; a student's glasses were left at home; a teacher scheduled a field trip or film strip without informing the school psychologist. These, and a host of other similar practical matters, often disrupted the school psychologist's carefully arranged plans.

Not only did the itinerant status lead to a tight schedule, but it also disrupted the school psychologist's careful planning. If one student was absent or on a field trip, the psychologist could not simply turn to the next one on her list of those requiring testing from that school. The records were maintained at a central office; the school psychologist would have had to drive from one school to another just to get the necessary forms, and then spend time reviewing the case before administering tests, further disrupting the schedule. A week would pass before she visited that school again. As a result, the test was postponed until the next available time slot, thereby displacing the child scheduled for the second slot who had in turn to be "bumped" to

yet another time slot. This rescheduling cascade produced delays throughout the referral system. For this reason alone, it is not surprising that it took an average of 52 days to process a child from the date of official referral to the end of assessment.

Another set of factors that compounded the assessment of referred students by the school psychologists concerned the availability, or rather, the non-availability of facilities. Not only did the school psychologists have to travel between schools within the district, but they also had to share office space with many other specialists at the schools they visited. Under optimal conditions, appropriate space would be set aside for the psychologist on the day that she was scheduled to visit a certain school. Still, the seemingly inevitable misscheduling, unexpected meetings, and mistakes often resulted in the postponement of testing sessions.

FISCAL AND LEGAL CONSTRAINTS ON DECISION MAKING

Accompanying these factors that originate within the district are others that impinge from outside. Internal and external factors operate together to constrain placement decisions and the processes by which special education decisions are reached. Ironically, perhaps, many of these external circumstances have their origin in the very law that was written to aid handicapped children and facilitate their education. Public law 94-142 has specific guidelines concerning the number of students it should serve. Testimony offered and reports written at the time the law was being considered by Congress indicated that 12 percent of the school-age population was expected to be in need of special education. One could imagine that those figures were an estimate, a best guess by the special education constituency. The Office of Education in its first report to Congress on the implementation of the law found that the states, on average, were serving 7.4 percent of the school-age population (USOE, 1979). School districts and state agencies were criticized for not reaching enough students. It appears that the 12 percent figure was not an estimate at all, but a compulsory figure. This thrust of the law provides an incentive to place students in special education programs in order to meet legal guidelines.

Coast District did not have 12 percent of its school population in special education programs at the time an audit was conducted by a special education agency. Special education teachers reported to us that they received strong recommendations to find more children in order to meet the quota, or suffer the consequences of not meeting federal guidelines.

The legal incentive to search for special education students is reinforced by financial incentives. School districts receive state and federal funds for each child in school; the amount is calculated on the basis of the average daily attendance (ADA) of the district. Coast District received $1,335 for each student in regular classrooms; the rate is increased to $2,374 per student for pullout programs like Learning Disability Group (LDG), and to over $3,000 for Multiple Handicapped (MH) programs. This difference in funding serves as an incentive to increase the number of students in special education. As we have seen, the increase in ADA funding was sufficient to convince the Coast District to provide special services to its multiple-handicapped students on its own premises, rather than transport them outside the district to a special school.

The Coast District opened a new school near the end of the 1978–79 school year. After the students who were transferred from other schools within the district were sorted out and transfers from other districts reassigned, administrators discovered that there was not a full complement of students in special education programs at the new school. Instead of the 11 students required for an EH classroom and 25 for one LDG teacher, there were 8 EH and 12 LDG students. The teachers complained that there were not enough children in their programs and were afraid that the district would lose some of its special education money as a consequence. A reduction in funding would mean the loss of classroom aides, a decrease in availability of special equipment, and reduction of special salaries. As a consequence, the staff at the new school conducted an organized search for candidates for special education programs.

If there are fiscal and legal incentives to locate and place students in order to receive the maximum federal and state support, so, too, there are disincentives to find too many special education students. Special education funds are not unlimited. A ceiling is reached when a certain number of students are placed in a given special education program (e.g., when the 12th student is placed in an EH classroom, the 26th student in an LDG program, etc). Beyond that point the school districts do not receive additional money from state or federal agencies.

These financial and legal considerations constrain placement decisions. Educational decision makers take the number of students already assigned to special education programs into account when making placements. Students are more likely to be placed in a special education program that is short of students than in a program that is full. We found that students are not likely to be removed from a

special education program and returned to the mainstream until there are others to replace them. This exchange policy keeps the total number of students in the program at the maximum level. Moore et al. (1981: 93) report similar tradeoffs by local school officials between politics, money, and student needs in their study of placement practices. Oak Park, for example, had enough "linguistically different students" to permit setting up a bilingual program. Since the excess costs associated with the program would be only partially reimbursed by the state, the community rejected the plan. It is apparent, then, that the legal, fiscal, and practical circumstances that place constraints on educational decision making can of themselves create handicapped students.

INSTITUTIONAL ADAPTATIONS TO LEGAL MANDATES

The stated purpose of PL 94-142 is individualized instruction, i.e., locating the best learning environment for the student with special education needs. In order to ensure that school districts achieve these goals, the law mandates (1) the composition of decision-making groups to identify, assess, and place special education students; (2) informed consent by parents for special education actions; (3) the sequence in which the steps in the referral process are to be carried out; and (4) a time-frame for completion of the referral process.

The personnel requirements, informed consent obligations, and the sequential and temporal parameters dictated by law created an entirely new situation for school districts. Conformance was especially difficult in the Coast District, which was unable to meet many of the legal requirements with the human and material resources that were available.

Nevertheless, students were identified, assessed, and placed into special education. The referral system was constantly active. Reports were written and filed with the appropriate state and federal agencies. In that sense, the district conformed to the requirements of the law, but the process was neither automatically nor easily achieved. The district did not simply match previously established operating procedures to new problems; it had to develop entirely new ways of working within the practical circumstances inherent in institutionalized educational practice.

Special education laws require that school districts conform to a rigid time-schedule during the referral process. Once a child has been referred, the appropriate special education staff has 15 working days in which to assess the student's needs, develop an assessment plan,

and forward it to the student's parents. Once permission for assessment is received from the parents, an Eligibility and Placement Committee meeting must outline an appropriate educational program for the student within 35 days. Within 20 school days of the E&P meeting, the student must be enrolled in the prescribed program. In sum, then, the school district has 70 school days in which to identify, assess, and place a student in a special education program.

Because of the difficulty in coordinating educators' and parents' schedules, because of the itinerant status of the school psychologists, and because of the difficulty in assembling records, it was extremely difficult for the district to complete a case within the time limits imposed by the law. Assembling records and obtaining parents' permission was particularly difficult. Records often had to be obtained from another district, a private counselor, or a hospital. Parents, whose consent is required before any classroom observation or individualized assessment can be conducted, were difficult to reach. In some instances they had moved from one residence to another within the district, or moved in and out of the district, further complicating coordination.

The school district responded to this constraint on its operating procedures in creative ways, perhaps most effectively in its bookkeeping practices. It turns out that 15 working days is not enough time to process a referral from the teacher through the principal to the School Appraisal Team, develop an assessment plan, and notify a student's parents. The backlog of cases and the problems in arranging a meeting often delayed for weeks the first presentation of a case to a SAT, which was only a preliminary step to the construction of an assessment plan, the real heart of the initial referral process. In a manner reminiscent of the procedure used in the U.S. Senate to complete business near the end of a session, the district stopped the clock on the early phases of the referral process. Instead of dating a referral form on the day that a teacher filled it out, the date of its actual presentation to a SAT meeting was recorded. This practice of "stopping the clock" cut weeks from the amount of time a student's case spent in the referral system, since the clock did not start until the case had actually been heard by the committee. Even with the introduction of this practice, the amount of time required to process a case from referral to placement averaged longer than the time-frame specified by law.

Another bookkeeping practice that helped the district meet the requirements of the law involved a distinction between "teacher noti-

fications" and "official referrals." The former were the reports made by the teacher to the SAT about a student who needed help; the latter were the reports presented to the SAT on the day that the case was actually heard. The difference between the two reports was in the date stamped on the forms. Thus, the performative act of date-stamping was functionally equivalent to saying "I do" in a marriage ceremony (Austin, 1962). The bride or groom's pledge said under the proper circumstances, with the right people present, at the right time and place, transforms a single person into a married one. Placing a date on a form transforms an informal teacher notification into an official referral.

This technical distinction was evident in the educators' everyday discourse and in their official texts. On the one hand, educators, especially those concerned in executive decisions, were careful not to cite a case as a "referral" unless it had been duly considered by a SAT for official record-keeping and documentary purposes. On the other hand, educators, especially those teachers who initiated the referral process, talked often and at great length about students as referrals in everyday conversations. In their parlance "referrals" included students being considered for special help, students for whom they had filled out teacher notification forms, and students who had actually been considered by official committees. This device of distinguishing between referrals in text and in discourse points out yet another way in which the identity of a child is determinerd by institutionalized practice. Regardless of his classroom behavior, academic performance, and educational needs, a student is not a referral student, institutionally speaking, until the date has been stamped on his case.

These relatively informal bookkeeping practices, which enabled the district to deal with the time constraints imposed by law, were complemented by a more formalized method of differentiating between less serious and more serious special education cases. The temporal parameters of the law, the limitations on a system with too many students and too few resources, and fiscal incentives to identify a certain percentage of students as "special" combined toward the creation of an alternative method of processing referral cases. Students of organizational life (e.g., Selznick, 1949; Dalton, 1959) might predict that these educators, faced with very strict rules, would develop informal, even devious, ways of circumventing restrictions in order to solve problems. When we first saw the constraints under which the educators in this district were trying to operate, we, too, expected to see

the development of informal practices such as unofficial discussions, surreptitious classroom visits, and clandestine discussions in teachers' lounges.

But we were wrong—or, rather, we were not right enough. Instead of adopting informal methods of circumventing rigid legal requirements, these educators built informal procedures right into the formal system. A "Child Guidance Team" was formed at each school site. This team was composed of a special education teacher, the nurse, the principal, and the reading teacher. In its composition this team was identical in many respects to the School Appraisal Team—an overlap that was not in the least accidental. After this practice was introduced, a case was first referred to the Child Guidance Team (i.e., not directly to the School Appraisal Team), whose responsibility it was to evaluate the merits of the case. When a case is under the purview of the Child Guidance Team, an official referral has not been declared. The unofficial teacher notification that exists in the everyday discourse of the educators has not been transformed into official texts. Therefore, the requirements to start the referral clock and to obtain parental permission before conducting classroom observation and psychological assessment do not apply.

If the Child Guidance Team concluded that some sort of evaluation seemed to be warranted, then special education teachers, nurses, or reading specialists were dispatched to make assessments, classroom visits, and to conduct child interviews. Since these interventions were done in the name of the Child Guidance Team, they did not fall under the parent-permission guidelines of special education law. Based on the information it obtained, the Child Guidance Team either referred the case to the School Appraisal Team or recommended that no further action be taken.

The commitment to formality is the interesting aspect of this district's response to the legal requirements to process special education cases within a certain period of time. Instead of circumventing the law by informal means, the district made an informal component an integral aspect of a highly formal bureaucratic system.

SUMMARY

In the seventeenth century, scientists concluded that the collapse of bridges proved that bridges couldn't be built. The reasoning that led to that conclusion is comparable to the reasoning used by educators who place the blame for the failure of the educational system on children. Instead of viewing children as the source of the problem, we have been

looking at the institutional practices that serve as the foundations upon which educational programs are built. We have described a number of seemingly mundane concerns that plague schools and other bureaucratically arranged organizations: budget, personnel shortages, excessive workload, and shortages of time. We have also described educators' responses to these practical problems, including formalizing informal procedures and keeping records creatively. Examined individually, the actions that educators take in response to these problems and concerns seem innocuous and of no particular consequence. Taken together, however, these activities become a family of practices that operate at a structural level to constrain the decision making involved in identifying, assessing, and placing students in regular and special education programs.

The routine bureaucratic practices of discouraging referrals from competing educational programs or at certain times of the year, or changing administrative procedures, or building a special classroom for students instead of sending them out of the district, structure students' educational opportunities by regulating their access to certain educational programs. As a consequence, students' educational careers are influenced by such considerations as the school calendar, the demographic population of the school, the financial condition of the district, and the resources available to it. This means that a designation like "handicapped student," "learning disabled student," or even "normal student" is a feature of institutional practice. It is not merely a function of students' background characteristics, talent, or academic effort.

The educators' practices of formalizing informality, creative bookkeeping, and distinguishing between referrals in text and discourse points out another shortcoming in official records when used for research purposes (Cicourel and Kitsuse, 1963). An investigation of the temporal parameters of the referral process that relied on the official documents produced by the school district would reach a much different conclusion about the time it took to process special education cases than an investigation that examined both the documents and the interaction in committee meetings. A study of official records would show a school district that met the temporal requirements for processing referral cases. A study of official documents in light of educators' interactions would also show a district that met legal requirements, but it would also show the organizational circumstances under which the district must operate to meet legal requirements and would reveal the organizational practices that are developed to achieve this

conformity. It was for reasons such as these that we decided to follow students' careers through the referral system. We have found that a better understanding of organizational practice is achieved when the activities of organizational members are placed in their everyday context and organizational outcomes are not divorced from the organizational practices that produce them.

TEACHERS' INTERPRETATIONS OF STUDENTS' BEHAVIOR

A student's special education career most often begins in the classroom when a teacher refers a student to the School Appraisal Team. Students are referred for a number of reasons, including misconduct, academic difficulties, and psychological problems. In this chapter, by exploring the relationship between what teachers say about what students do in classrooms and what students do in classrooms, we seek to determine whether students' referrals have common features even though they have been made by different teachers in different classrooms.

THEORIES OF STUDENTS' DIFFICULTIES IN SCHOOL

Our analysis of teachers' interpretations of students' behavior is centered on theories of students' academic performance. The main theories can be clustered into two groups—the "realist" theory and the "mentalist" theory—and are linked to the theories of the relationship between schooling and students careers (see Chapter 1). These theories take a position on the source or location of students' success or failure. Proponents of a realist theory of students' academic performance concentrate on the characteristics of students' behavior. Proponents of a mentalistic theory concentrate on the person perceiving the student, e.g., the classroom teacher or school psychologist.

Realist explanations of differences in students' school performance cluster around the concept of students' characteristics. They have attributed success and failure both to characteristics inherent in students, such as linguistic styles, cognitive styles, or hereditary factors, and to characteristics in the life around students: their socioeconomic

backgrounds or home environments. What are being called realist theories here are similar in that they locate the cause of school achievement in and around the students themselves, particularly students' psychological states and traits.

An example of a realist account of students' school performance is that of Bereiter and Englemann (1966), who focus upon differences in students' cognitive styles. They conclude that the language of ethnic-minority and lower-class preschool children is "inadequate for expressing personal or original opinions, for analysis and careful reasoning, for dealing with anything hypothetical or beyond the present, or for explaining anything very complex" (1966: 32). They argue that linguistic deficiency is the basis of the poor school performance of "disadvantaged children." The notion of linguistic deficiency informs such increasingly popular instructional packages as DISTAR that teach poor and ethnic-minority children by drill and practice, rote learning, and by dispensing tangible positive reinforcements.

Differences in cognitive styles are said to account for the poor performance of Mexican-American children in comparison with Anglo children:

Research has shown that Mexican American and Anglo-American children perform differently on cognitive tasks as well as on tasks reflecting incentive-motivational and human-relational styles. These findings can be explained by the conceptual framework of field sensitivity/field independence. It was hypothesized that differences in cultural values are reflected in socialization practices, which in turn result in differences in cognitive style. . . . That is, Mexican American children are relatively more field sensitive and Anglo-American children more field independent in cognitive style. [Ramirez and Castaneda, 1974: 79]

States and traits assumptions have also found their way into the "medical model" inherent in PL 94-142. The medical model is a conceptual tool that has been used in medical research to understand and combat pathological conditions in the organism. It assumes that symptoms are caused by some biological condition: "In the medical model, the organism is the focus of assessment and pathology is perceived as a condition in the person, an attribute of the organism. Thus, we say a person *is* tubercular, or *has* scarlet fever" (Mercer, 1979: 95). The medical model is explicit in the Education for All Handicapped Children law, which has specific provisions for correcting the physical state of students, e.g., "health, vision, hearing . . . and motor activities" (Federal Register 121a532 (3) F). Moreover, the underlying assumptions of the medical model have been extended beyond the physical

states of students considered for special education. Attributes such as intelligence, aptitude, potential, or mental ability are also considered to be internal states or traits. When mental states are equated with physical states, educational handicaps become equated with diseases. Just as a person is said to "be tubercular" or "to have" scarlet fever, a student is said to be EH or to have a learning disability. When this line of thinking is carried to its logical conclusion, educational handicaps become subject to diagnosis and treatment in the same way as other diseases.

A second set of explanations of differences in students' school performance shifts the reason for success and failure from the characteristics of the student to the heads of educators. The most notable example of mentalistic accounts of school performance is "expectancy theory" (Rosenthal and Jacobsen, 1968; Bar Tal, 1978). In its most extreme and simplistic form, expectancy theory assumes that it is not the students' characteristics or behavior that leads to success or failure; it is the expectations that teachers have for students' behavior that causes these academic outcomes (Hargreaves et al., 1975; Rist, 1977).

Expectancy theory bears a strong family resemblance to labeling theory (Griffin and Mehan, 1980), especially as the latter has been applied to the identification of mentally retarded students (Mercer, 1974) and the study of rule-breaking in classrooms (Hargreaves et al., 1975). Instead of searching for the source of deviance in the biological make-up of the actor (Sheldon, 1949), the early socialization of the child (Cohen, 1955; Sutherland and Cressey, 1966), or in the breakdown of the social structure (Merton, 1949), labeling theorists (Lemert, 1951; Kitsuse, 1962; Becker, 1963) looked to societal reactions to actions as the basis of deviance. According to labeling theorists, the main difference between normals and deviants is that deviants have been apprehended and processed by formal institutions (e.g., courts and hospitals), while so-called normals have not, in spite of having committed similar acts in many cases. Thus, from the point of view of labeling theory and its cousin, expectancy theory, the reasons for students' success or failure are not to be found in the acts or characteristics of students; rather, they are to be found in educators' reactions to student behavior. Students are successful or unsuccessful not because of the inherent characteristics of their actions, but because they have been so labeled.

THE CHRONOLOGY OF THE RESEARCH

We are interested in the viability of these two accounts of students' success and failure in school. The fact that teachers routinely refer

students to special education provided us with a naturally occurring situation in which to study these contrasting theories.

The materials for our examination of both students' behavior and teachers' treatment thereof come from three sources: teachers' referral reasons recorded on official school-district forms, videotaped segments of classroom interaction, and viewing sessions in which teachers were questioned about the events recorded on videotape. The videotapes provided data about student-teacher interaction. The official referral reasons and teachers' comments during viewing sessions provided data about teachers' interpretations of the interaction.

In order to locate students who had been referred for special education, we contacted classroom teachers after they made referrals; 27 teachers who had referred 55 students agreed to participate in this phase of the study. Of the 55 cases, we selected for in-depth analysis 17 cases that represented the major placement categories in the referral system (see Chapter 4, Tables 1 and 2). After a teacher made a referral, a member of the research team observed in the classroom to obtain a sense of classroom routine. Based on these observations, representative classroom events that involved the referral student were videotaped. Preliminary comparisons of the behavior of referral and non-referral students were made, and viewing sessions were scheduled.

Inasmuch as the teachers had made referrals prior to our classroom observations, our methodology is, of necessity, reconstructive. We are trying to approximate a delicate decision-making process in which teachers make determinations about students' performance and single out certain students for referral. There is, however, a lapse in time between teacher referral and viewing sessions. There are differences in the demands of the classroom in which the decision is made and the demands of the viewing session in which the decision is recounted. These differences make it impossible to duplicate the actual perceptual process by which the teachers identify referral students. However, we are attempting to create a kind of natural experiment, in a natural setting, to re-create as closely as possible what might have happened at the time of referral. We consider this reconstructive approach preferable to other methodological alternatives. In striking a balance between fidelity to the spontaneity of the original situation, on the one hand, and control over observations, on the other, a certain ecological validity is achieved.

While they viewed the videotaped classroom event, the teachers were first asked for general information about their classrooms, then to recount the reasons they referred each student, and finally to com-

ment upon the student's behavior on the videotape. They were invited to "stop the machine whenever something interesting that you want to report on appears on the tape" (cf. Erickson and Shultz, 1982). Teachers were also given the following specific instructions for asking the interviewer to stop the tape (1) "when the child who was referred is doing something about which you would like to comment"; (2) "when you or the children other than the referred are doing something about which you would like to comment"; (3) "when you see a comparison between behavior and/or ability of the child referred and other members in the group"; (4) "when you see some of the behavior on the tape that could have caused you to refer the child." In our analysis, we shall distinguish the stated "interview reasons" from the "official reasons" for referral that we obtained from the students' school records.

The teachers' identifications of referral behavior during viewing sessions were juxtaposed to an independent analysis of taped classroom events conducted by Hertweck and two research assistants. The official and interview reasons for referral were used as a template or emic grid to search for equivalent instances of behavior elsewhere on the tape.* First, the team noted each teacher's categories for referring a student, e.g., low academic performance, poor peer relations. Second, the team noted the instances of behavior associated with each category, e.g., that poor pronunciation and hesitation in reading were instances of low academic performance, and not joining in group activities was an instance of poor peer relations. Third, the entire tape was reviewed for evidence in other instances of those behaviors in the conduct of referral students in the events.

COMPARISONS OF CLASSROOM BEHAVIOR

When we began this project we believed that a discrepancy between students' behavior and the "hidden culture" of the classroom would be influential in the formation of teachers' referrals. Studies of the structure of communication suggesting that participants in successful communication encounters synchronize their verbal, paralinguistic, and kinesic behavior in rhythmic patterns (Scheflen, 1972) have supported our thesis. When miscommunication occurs, participants have been found to be "out of synch," or not attuned to a common conversational rhythm (Scollon, 1981). Our belief was further strengthened by studies of communication in classrooms. Mehan (1979) had observed that students who had been successful participants in class-

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*We are indebted to Jürgen Streeck for suggesting that we view the behavior of referral and non-referral students in this way.

room lessons were attuned to the tacit rules of classroom order, whereas unsuccessful participants did not display an orientation to unstated normative demands. On the basis of this and related classroom research (Byers and Byers, 1972; McDermott, 1976; Erickson and Schultz, 1977), we expected that our analysis of classroom interaction and our interviews would show that the behavior of referred students would not be synchronized with the conversational rhythm of classroom events. Although we did not necessarily expect that the teachers would give verbal evidence of this lack of synchrony during interviews, we did expect to see evidence of teachers' orientations to absences of synchrony in teacher-student interaction.

Our study of the 17 classroom tapes selected for detailed analysis did not bear out our initial assumptions. Only one of the 17 students did not seem to be oriented to the norms of classroom decorum, and 8 were classified as only "moderate norm violators." The behavior of the remaining students in our sample did not appear to be appreciably different from the behavior of students who were not referred; they conformed to classroom rules. Both referred and non-referred students seemed equally attuned to the culture of the classroom. Furthermore, no correlation existed between deviation from classroom norms and the disposition of referral cases. Three "moderate norm violators" were placed into regular education, and an equal number into special education programs. Only one more disruptive student was placed in special education than into regular education.

Why didn't we find that referral students were more "out of synch" with classroom communication patterns than students who had not been referred? Before accepting the obvious answer—that a lack of orientation to the tacit classroom culture does not inform teachers' judgments—we must consider some methodological issues. It is possible that the phenomenon was present and operating in the classrooms in our sample, but we were not able to observe and record it. That is, there may have been a lack of synchrony between teachers and students in the classroom that failed to appear in the events we selected for taping because of bad sampling. The small number of events, their formality, or the actual act of recording may have been responsible for our inability to see a discrepancy between students' behavior and classroom conversational rhythms.

Even though our intuitions and previous research continue to support the notion that a lack of synchrony between teachers and students leads to negative teacher evaluation, we must withhold judgment on that issue. Of necessity we turned our attention from the

behavioral basis of teachers' referrals, and focused it on the relationship between teachers' accounts and students' behavior. As a result, we do not have an answer to one of the questions that oriented this research in the first place: how do teachers form categories about students' inappropriate classroom behavior? Our investigation of the relationship between teachers' accounts and students' behavior is instructive, however, about how teachers use categories once they are formed.

Teachers' Accounts and Students' Behavior

The teachers' comments during viewing sessions, plus our independent analysis of the taped classroom events and school records, form the basis of our observations:

1. Teachers did not point out every reason why they referred a student who appeared on the videotape. They pointed to an instance of their "official" referral reason 48 percent of the time and to instances of their "interview" reasons 40 percent of the time.

2. Teachers did not favor particular referral reasons by uniformly identifying behavior only within particular categories. They pointed to instances of academic, behavioral, psychological, and social categories approximately 50 percent of the time and to physical reasons 25 percent of the time. An "academic difficulty," such as poor handwriting or "working below grade level in reading and spelling," was as likely to be identified as was a behavioral problem such as disruptive classroom behavior.

3. Although teachers in general were not more likely to identify particular categories of referral reasons in general, particular categories had more salience for particular teachers. Teachers located at least one and frequently many instances of a particular referral category, but they identified no instances of other referral categories. Although a teacher may have given a referral reason within a particular category, she did not necessarily point out an instance of that category.

We find the same pattern in the way teachers identify instances of referral behavior as we did in the way teachers identified categories of referral reasons:

4. Teachers did not point to each instance of behavior that constituted a referral category. They identified 36.7 percent of the instances of referral behavior that appeared on the videotape they viewed.

5. The instances of behavior identified by the teachers were usually the ones that appeared first. The teachers did not watch the entire tape, which includes a number of instances of behavior, and then

point out the last one as the referral reason. Instead of enumerating long lists of referral behavior, they used exemplars (Smith and Medin, 1979) to identify referral categories and instances of referral behavior. The process of categorizing by exemplars is analogous to the "documentary method of interpretation," which consists of the search for "an identical homologous pattern underlying a vast variety of totally different realizations of meaning" (Mannheim, 1952). Garfinkel (1967: 78) explains the documentary method as consisting "of treating an actual appearance as 'the document of,' as 'pointing to,' as 'standing on behalf of' a presupposed underlying pattern. Not only is the underlying pattern derived from its individual documentary evidence, but the individual documentary evidences, in their turn, are interpreted on the basis of 'what is known about the underlying pattern.' Each is used to elaborate the other."

One or two instances of behavior exemplify, stand for, and document the referral category, and the category is represented and elaborated by the exemplars of behavior. This hermeneutic spiral of a part-for-whole, whole-for-part relationship (Mehan and Wood, 1975) is signaled in the teachers' discourse by expressions such as "That is a frequent response of his" or "So watch what he does during the videotape, it's typical."

Another step in our analysis was to compare teachers' identification of behavior by students who had been referred for special education with behavior by students who had not been so referred. All but one of the teachers identified more behavior for the former group than for the latter. In three cases teachers did not point to any behavior displayed by non-referral students. Of a total of 254 referral behaviors displayed by referral students, 118 were identified. Of 108 referral behaviors displayed by non-referral students, only 15 were identified, i.e., 46.5 percent of the behavior by referral students was identified, as against 13.9 percent of the behavior by non-referral students. That is to say, we encountered instances in which the teacher identified a certain set of categories of behavior as reasons for referral and identified some of them in the behavior of the referral student on the tape during viewing sessions. On the other hand, instances of the same sort of behavior are apparent in the behavior of other students in the same event on the tape, but the teacher does not identify them as instances of referral behavior, nor is the child identified as a referral student.

The following teacher-student exchanges exemplify this point. In the event used in the viewing session with the teacher, the two chil-

dren were referred for practically the same reasons: "they both lacked self-confidence" and "continually expressed concern over getting their work done and the difficulty of their work." In the course of the viewing session, four different segments of the tape elicited comments from the teacher with regard to this lack of self-confidence in the referral children. We present three of the segments, followed by the teacher's comments regarding the lack of self-confidence referral reason. (In the three segments, students 1 and 2 are referral students and students 3 and 4 are other students engaged in the taped lesson.)

SEGMENT 1

[Scene: A math lesson, in which students are arranging geometric shapes, called tangrams, into a pattern on a page.]

5 *Teacher:* Okay. We're going to do something a little different today. I'm going to have you cut these out and you're going to do some puzzles, make some puzzles with them. [Shane returns to group.] And I want to *watch* how you do it, and we'll talk about how you're putting these puzzles together. The first thing you need to do is each of you are going to get a colored square like this [draws shape on card] and cut out on all the lines very, very carefully.

6 *Students:* Um hum.

7 *Teacher:* Because you need them really straight. Okay? Do you see that? So I'll give each of you a different color. [Passes out material.] Cut out the whole thing, uh huh. The whole thing. Along all the lines now. *Yes*, go ahead and do that. [Students begin cutting shapes.] Okay, cut out on all the lines. And *then* you're going to be working with these pieces and trying to put them in a picture. Make a puzzle. Have you done these before?

8 *Student 3:* I have.

9 *Teacher:* Very good. Be sure you cut carefully on each line, okay?

10 *Student 1:* Can we go out of the line?

11 *Teacher:* A little bit but try to keep on the line as much as possible. All right? I think I'll do one too. Let me get the scissors. [Stands up.] Billy, well just try to make a little outline of it. Shane, you want to sit down? Make a sketch of it. I'll know what you mean.

12 *Student 1:* Miss Allen, could we just cut like *this*?

13 *Teacher:* Yeah, yeah. But don't lose any of your pieces though. Put the pieces behind you when you cut these off and don't lose any of those little pieces, okay?

14 *Student 3:* My little pieces are right there.

15 *Student 1:* Some people are going to have different kinds of shapes, aren't they?

16 *Teacher:* No. Everybody will have the same shapes. These are all start out from the same square.

17 *Student 1:* But we won't be cutting out the same way.

18   *Teacher:* [To group] Okay, put your scraps behind you and your scissors be-
        hind you *so*, you've got room to work in front of you there.

19   *Student 1:* We won't be cutting the same way. We won't be cutting the same
        way.

20   *Teacher:* What do you mean?

21   *Student 1:* Some people might be cutting different.

22   *Teacher:* But we're all starting out with the same square and the same shape.
        Right? See that? Look.

TEACHER'S COMMENTARY ON SEGMENT 1

[Transcript no. 11; the tape has stopped.]

118   *Teacher:* I've been noticing all along what's coming out with Christian. He's the
        blond one.

119   *Interviewer:* The blond-haired one. Okay.

120   *Teacher:* And, um, that's one of the things that I've been concerned about with
        him, is that he constantly needs to know whether he's doing it right.

SEGMENT 2

[Scene: the same lesson; the teacher has passed out a new pattern.]

72   *Teacher:* I'm going to give you different so that you can stand out, yeah.
        [Everyone speaks out at once here about colors.]

73   *Student 4:* I want this color.

74   *Teacher:* They'll all fit, I assure you. It's the same house. Okay. Okay. Try and fit
        the shapes so that they fill in the house. [Students begin working.]

75   *Student 2: No way.*

TEACHER'S COMMENTARY ON SEGMENT 2

[Transcript no. 11; the tape has stopped.]

125   *Interviewer:* Who said that?

126   *Teacher:* "No way." Shane said that.

127   *Interviewer:* Okay.

128   *Teacher:* He's the one back here.

129   *Interviewer:* Okay. Okay.

130   *Teacher:* Yeah he, he starts out like that with a lot of things. It's like, I can't do
        it. He's just glancing at it. . . . He's very apprehensive about approaching
        anything. But once he gets into it, and, or finishes something he's just so
        pleased with himself. And I'll say, hey, I thought you said "No Way." "Well"

SEGMENT 3

[Scene: the same lesson; the teacher has passed out a new pattern.]

131   *Teacher:* Yeah. You keep the shapes, you're going to use the same shapes all
        right. [Passes out materials.] I want you and try to make a whale.

132   *Student 1:* Okay, that's //

133   *Teacher:* = You try and make an "E."

134   *Student 2: Oh, no, me and my big mouth.* [Sings.]
135   *Teacher:* An arrow.
136   *Student 3: Ohh.*
137   *Student 2: Me and my big mouth.* [Sings.]
138   *Student 4:* What are you trying to make?
139   *Student 3: Uh oh.*
140   *Teacher:* They're each working on something different now.
141   *Student 2:* See if this fits. Oh goodies.
142   *Student 4:* I don't know if that fits.
143   *Teacher:* Well, does it leave you a triangle space for the other one? Switch it around somehow so that it will leave you a space for that other triangle.
144   *Student 2: It's impossible, Mrs. Allen,* to do one like this way. To do an E with one of these shapes.
145   *Teacher:* You think so?
146   *Student 2:* Uh huh.
147   *Student 1:* Nooo.
148   *Teacher:* Just try. Move them around.

TEACHER'S COMMENTARY ON SEGMENT 3
[Transcript no. 11; the tape has stopped.]

406   *Teacher:* I mentioned before, yeah, that whenever he's given some new task to do it's always like, too hard, no way I can do it, until we, oh, come on, you just get into it and try it. When he finishes, I mean it's like fantastic, you know, that he did it.

The teacher did not stop the tape or comment on it when other students said similar things at numerous places in the lesson. For example:

[Scene: the same math lesson, in which students are arranging geometric shapes. Recall that student 1 is a referral student; student 3 is not.]

89   *Teacher:* So you move the other pieces around and see if you can get the bottom part of the building.
90   *Student 3:* The bottom part's hard.
91   *Student 1:* This part can't get filled.

In this exchange both students—one who has been referred and one who has not been referred—expressed concern over the difficulty of the task, yet the teacher neither stopped the tape nor commented on it. In fact, the difficulty of the task was a constant concern for all students during the lesson; the two referral students and two non-referral students commented on it an equal number of times. Nevertheless, the teacher did not treat the comments by the non-referral students as instances of the concern-over-work difficulty referral cate-

gory during the viewing sessions; she did, however, treat similar comments by the referral students as exemplifying this referral category.

Similar behavior was displayed by a referral student and a nonreferral student in another classroom. "Eddie" had been referred for many reasons, one of which was "hitting other people." At the opening of the videotaped reading lesson he began hitting the student seated beside him. During the viewing session the teacher stopped the tape at that point and cited this as an example of the behavior for which Eddie had been referred. Later in the same reading lesson, another student who had not been referred struck Eddie on the head. The teacher did not stop the tape or comment on the incident.

These examples suggest a way in which expectations lead teachers to treat behavior differently in different students. One interpretation of this apparent differential treatment would be the halo effect: the teacher concentrates on the behavior of one child and ignores the behavior of the second child. Our analysis suggests an alternative interpretation. Teachers are not reacting to discrete pieces of information; they do not seem to be separating students' behavior (e.g., hitting a child or saying, "it's too hard for me") from the circumstances surrounding it. Instead of attending to behavior in isolation, teachers are attending to action in context. The context, in turn, includes the student, the task, the lesson, and the situation in which the action transpires.*

A musical analogy may make this point clear (see Erickson, 1982, for a more extensive elaboration). When a musical sequence is heard one receives, in addition to the sensory elements (the notes), a certain overall impression to which the term *melody* is attached. This overall sense of melody is not attributable to any of the single notes taken alone: the melody presents itself as an immediately perceivable whole. So, too, the students' action in a context presents itself to the teacher as a unified whole, an "ensemble" of perceptual particulars (Gurwitsch, 1966: 23–27). Because the teacher is attending to ensembles, perceptual wholes, and not discrete elements, a piece of behavior is not the same when it is conducted by different people in different contexts. "Johnny hitting Mary during math" is not the same as "Mary hitting Billy at recess." So, too, Duke saying, "this is hard," is not the same as Shane saying, "this is hard." In this way a "slap in the

*Here, "action" is meant in Weberian (1947: 80) terms: "all human behavior when and insofar as the acting individual attaches a subjective meaning to it. . . . Action is social, insofar as, by virtue of the subjective meaning attached to it by the acting individual (or individuals), it takes account of others and is thereby oriented in its course."

face" takes on different meanings when embedded in different class-room contexts.

## Interpreting Teachers' Interpretations

There does not seem to be a behavioral basis beneath teachers' re-ferrals. Furthermore, there is considerable variability in teachers' interpretation of students' behavior. We will now juxtapose these ob-servations against the theories of school success and failure discussed at the outset of this chapter.*

In order to understand the complex basis of referrals and the vari-ability in interpretations of behavior, we must abandon completely, or collapse at least, mentalistic and realist perspectives. In the discussion that follows, we propose that the inability of those perspectives to ac-count for the variability in interpretations is the result of confusion between the classification of physical or visible objects and of cultur-ally constructed objects. Or, to phrase the issue differently, there is a confusion between "brute facts" and "institutional facts" (Vendler, 1972; Searle, 1969: 184–85).

Some background is necessary in order to make this point. There-fore, we will describe methods for classifying three types of objects: visible, mediated, and culturally constituted. After we disentangle the confusion between brute and institutional facts, we will propose a way to account for the manner in which teachers interpret students' behavior. This interpretation places learning disabilities and educa-tional handicaps within a cultural meaning system.

The Classification of Visible Objects

Physical objects are visible and available to perception; the classifi-cation is really a process of labeling. A sign—for example, a word in a language—points to, indicates, or stands on behalf of a referent. The referent, in turn, is an object that exists in the world (Langer, 1942; Morris, 1964). Thus:

$$\text{sign} = \text{word (e.g., "chair")}$$
$$\text{referent} \qquad \text{object (\textit{chair})}$$
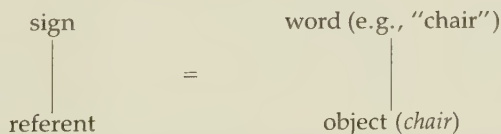
The meaning of the word is the object to which it refers. When objects are classified by a labeling process, meaning is established by osten-

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*This section is strongly influenced by ideas given to us in private conversation by Roy D'Andrade and Jürgen Streeck.

sive definition, i.e., by pointing to the object in question. This view of classification presupposes that there is an observable, empirical referent. An object in the world that can be seen or touched is necessary in order to establish the meaning of the word or sign used as the category name.

When observable objects are being classified, statements about the accuracy of the classification can be tested. The test of truth or falsity involves recourse to the presence or absence of physical objects. Objects can be pointed to in order to settle disputes about truth claims. It is for this reason that statements about physical objects have been called statements about brute facts, and collections of visible objects have been called natural categories. No amount of argument or discussion can make the physical presence of the object itself go away. There may be disagreement about the names and labels attached to the objects, but the physical presence of the objects themselves in the material world is beyond dispute.

The Classification of Mediated Objects

When the referent can not be seen, the direct relation between sign and referent or word and object that exists in labeling does not exist. Consider, for example, the entity "disease" or, more specifically, "chicken pox." We have the word *disease* in our language, which like the word *chair* refers to some thing; but the thing referred to by the word *disease*, unlike the thing referred to by the word *chair*, cannot be seen. We can not see disease directly; we can see only symptoms, indices, or effects of the disease: fever, spots that itch and turn red. As a result, the symptoms mediate the relation between sign and referent, or word and object (see Figure 4). Furthermore, the system of relations between sign, referent, and index is loose. Circumstances exist in which we can see symptoms and hypothesize the presence of the disease. There are also circumstances in which we can have the disease but not manifest the symptoms. This loose or "indexical" (Garfinkel, 1967) relationship between sign and referent or word and object makes it difficult to prove the truth or falsity of statements about mediated categories. For example, suppose someone has red, itchy skin. One can conclude that he has chicken pox and be correct. Yet, another person can manifest the same symptoms but suffer from a different disease. Itchy skin might be a symptom of an allergy and not chicken pox.

It can be argued that the presence or absence of a disease like chicken pox can be decided by scientific or medical investigation.
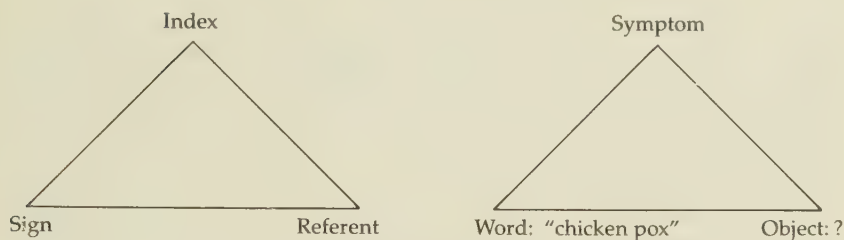
Fig. 4. Sign-referent relations in the classification of mediated objects

Medical practitioners can determine whether one is suffering from chicken pox or a skin allergy by carrying out a medical procedure such as a skin biopsy. The intervention of practices from a specialized field such as medicine can often resolve the ambiguity between one type of disease or another. While the medical practitioner can provide stronger evidence about the indexical relationship between one symptom and disease or another, it is still the case that he is not seeing the disease itself directly. A medical procedure like a skin biopsy is a more sophisticated index than an itching skin perhaps, but it is an index nevertheless.

Despite the fact that we can not see objects like disease directly, members of our society believe that things like disease exist. Disease is a significant part of our cultural belief system. Whether or not we can see disease, the disease has effects; we feel badly, can't sleep, have itchy skin and all the rest.

The Classification of Culturally Constructed Objects

The relationship between word, symptom, and object or sign, index, and referent is even more complex when we consider a disease such as schizophrenia. Like chicken pox, schizophrenia is not directly visible, but there are symptoms that point to the existence of the underlying disease. Significantly unlike chicken pox, however, there is no medical procedure that can provide additional evidence for its existence nor is there anything to put under the microscope or in the centrifuge. Not only is the object or the disease not visible; the symptoms of the disease are not visible either.

The looseness and ambiguity in the indexical connection between word and object when objects are not visible has led to a reinterpretation of the entire activity of classifying. Signs become related to objects, not by ostensive definition (labeling) or even by mediation, but by participation in a "cultural meaning system" (D'Andrade, 1985),

where objects do not exist independently of the actions of members of society. Instead, objects are defined through elaborate enactments of cultural conventions that lead in turn to the establishment of such well-documented "institutional facts" (Searle, 1969) as "touchdowns," "marriages," "insults," "banishments" and "property rights" (D'Andrade, 1985).

In order to understand how meaning is established in a cultural meaning system, let us consider a touchdown in the game of American football. Although it is possible to point to a constellation of actions on a football field and call it a touchdown (e.g., pointing to a man in helmet and pads crossing the goal line, to cheers from the crowd), the mere labeling of an action by an ostensive gesture does not capture the complexity of the action. The main reason for this gap between word and object is that touchdowns are part of a complex cultural activity. Cultural activities obtain their meaning, not by labeling or by mediated sign-object relations, but by the application and interpretation of constitutive rules—those rules that establish the very existence of human activities and the rights and duties of the people associated with them. Constitutive rules create the cultural possibility of activities. For example, the rules of football constitute a touchdown as a move in the game. It is not an exaggeration to say that touchdowns do not exist without the constitutive rules of the game of football.

While some constitutive rules establish moves in a game, other constitutive rules govern the game's participants. Not just anyone can score a touchdown; only those people properly designated as football players have this right. Even if a fan jumped out of the stands, grabbed a football, and crossed the goal line, it would not count as a touchdown. The fan does not have the right to perform that action under the rules of football. Still other rules govern the timing and conduct of actions. A football player does not score a touchdown every time he crosses the goal line. The game must be in progress; crossing the goal line can't take place during practice or a time-out. In short, what Austin (1962) called the "felicity conditions" of actions must be in force in order for actions to count as moves in a game. When this set of constitutive rules is in effect, actions become "touchdowns," "marriages," "banishments," "schizophrenia," and so forth.

If classification is viewed as the cultural construction of objects, then the confusion about sign-index-referent relationships disappears. We can understand why there is no single identifiable entity, marriage or schizophrenia, beneath a symptom or index. Schizophre-

nia and marriage are being constructed by cultural conventions in much the way that touchdowns are constructed by the constitutive rules of football. The difference between the "count as" relationship and the "indexing" relationship is crucial to understanding the cultural construction of objects. Instead of a symptom pointing to or indexing a disease, actions are constructed as counting as instances of a cultural category.

The variability in teachers' interpretation of students' classroom behavior and in the complex basis for referrals seem to be the result of a confusion between brute facts and institutional facts. The teachers in our study seemed to be treating learning disabilities and educational handicaps as brute facts. They saw educational handicaps either as labels for an observable behavior in their students, or as a disease mediated by behavioral symptoms. Recall that neither the teachers nor the researchers could pinpoint with any degree of accuracy the indices of the handicaps. Nevertheless, the teachers seemed to believe that educational handicaps were in fact hidden beneath the surface of the students' behavior, and indicated the symptoms on referral forms.

Now consider the possibility that educational handicaps and learning disabilities are neither internal states with labels attached to them by ostensive definition, nor diseases with mediating symptoms. Instead, they derive their meaning from their participation in an institutional variety of a cultural meaning system. Viewed in this way, learning disabilities are more like touchdowns and property rights than like chicken pox and asthma. They are defined as real by a complex set of legal and educational practices and governed by school rules and policies. They are objects that are culturally constructed by the rules of the school, its laws and daily educational practices. Just as the rules of football constitute touchdowns, so too the rules of special education constitute learning disabilities and educational handicaps. Without the institutional practices serving and guiding special education, we would not have learning disabilities or handicaps.

Lest this position be interpreted as completely nihilistic, let us hasten to say that we do not deny that some students have difficulties in school. We recognize that some students are seen to be withdrawn, and that others "act out." We are proposing that educational handicaps and learning disabilities are institutional facts and not brute facts; they cannot exist without an institutionally established machinery to recognize and identify them. Once we recognize educational handicaps and learning disabilities as institutional facts, then the absence of an empirical basis for teachers' referrals and the vari-

ability in teachers' interpretation of students' behavior is not surprising. The fact that during viewing sessions teachers do not locate on videotape each of the reasons for referring students indicates that learning disabilities and educational handicaps are being institutionally constructed.

SUMMARY

If learning disabilities and educational handicaps are understood to be culturally constructed objects rather than natural objects, institutional facts rather than brute facts, then neither the mentalist nor the realist perspective has an adequate account of teachers' interpretations of students' behavior. A social constructivist perspective (Mehan, 1984) maintaining that an object of perception such as students' classroom performance exists neither in the head of the perceiver nor in the object of perception seems to be supported by the data. Instead, objects result from "an interaction between the potential structure provided by the world and the particular emphasis and state of knowledge of the people who do the categorizing" (Rosch et al., 1976: 430). Cantor and Mischel (1979: 45–46), summarizing a long line of research in implicit personality theory and person perception, voice a similar position: "structure exists neither 'all in the head' of the perceiver nor 'all in the person' perceived; it is, instead, a function of the interaction between the beliefs of observers and the characteristics of the people observed." This image reflects the underlying premise of social constructivist theory: the objects of the world are social accomplishments. When perceiver and object come together, what is perceived is a function of the interaction between culturally provided categories that the perceiver brings to the interaction and new information about the object that occurs in the interaction.

There is an emphasis here on the process by which behavior and objects are socially constructed to count as categories such as "normal" or "special" student. From the perspective of a social constructivist theory, success or failure is not a function exclusively or primarily of students' characteristics or teachers' expectations. The social constructivist image perceives individuals acting together in organized contexts to create and maintain the link between behavior and categories.

Applying these notions to the particular context of classrooms, it appears that the teacher's decision to refer students is only partially grounded in the students' behavior. It is grounded also in the categories that the teacher brings to the interaction, including expectations

for academic performance and norms for appropriate classroom conduct. Furthermore, the categories that teachers bring to interaction with their students are not independent of students' behavior, as some versions of expectancy and labeling theory would lead us to believe. Rather, what teachers bring to the interaction with students seems to mediate what students do with the teacher in classroom interaction.

The final conclusion that we will draw from our analysis is that objective social facts such as students' intelligence and scholastic achievement are the consequence of two interactional processes: (1) between educators and students that produces an original designation such as "behavior problem" or "withdrawn student" and (2) between students' behavior and educational categories such that students' actions are taken to count as educationally handicapped or learning disabled.

PUTTING PSYCHODIAGNOSTICS
TO THE TEST

There are, as we indicated in Chapter 3, normal and special career paths through school. A special career develops when a student is removed from a regular education classroom and is placed in one of a variety of "special education programs." By tracing the careers of two students—one "learning disabled," the other "normal"—from the classroom through educational diagnosis, we will proceed in this chapter to examine the role of educational testing practices in moving students from regular to special education programs in the school system.

EDUCATIONAL TESTING AND
SPECIAL EDUCATION CAREERS

Before presenting the details of these cases, we will (1) describe the notion of "career" as it has been used in sociology, (2) comment on the role of educational testing in educational decision making, and (3) describe the methods we used to gather and analyze the case-study materials.

The concept of career was originally developed in studies of occupations. It referred to the sequence of an individual's movements from one position to another in an occupational system. This model was transformed by sociologists to study deviance (Hughes, 1948, 1958; Becker and Strauss, 1956; Becker, 1963), which has itself sometimes been viewed in labeling theory as a career. A "deviant career" entails the actual progression of a person through a series of positions in a social system. A career in this sense implies a potential beginning, intervening stages with distinctive features, and an end. Consequently,

the deviant label may or may not become the basis of a lasting or substantial identity. Labeling is considered the primary determinant of lasting career deviance. Rather than being a quality of an act, deviance is the consequence of the "application by others of rules and sanctions to an 'offender'" (Becker, 1963: 9).

The career concept has been extended to the study of health and illness (Parsons, 1951; Goffman, 1961; Scheff, 1966; Lemert, 1967). The identity that arises from the perception by others that a person is "sick" gives that person a label and a set of expectations. Whether the sick person's identity is imputed or ascribed by others or s/he views his/her behavior as others do, the identified person has at least temporarily strayed from one path (health career) to another path (illness career), and will remain there as long as the "sick" label is successfully applied. Illness need not necessarily lead an individual to a deviant career. It can be normalized if the illness is seen as curable by others and unintended by the sick person. However if s/he is seen as responsible, or the illness as incurable, the definitions of others become especially important since they influence and are influenced by organized agencies of social control (e.g., health-care facilities, state mental hospitals, and rehabilitation centers).

Frake (1961) has demonstrated that the notion of a chronic illness that can improve does not exist in preliterate societies. During a remission for example, one is not "still sick" but "is well." Subsequent symptoms are viewed as manifestations of a new illness, or of the same illness improperly cured. In other words, health and illness are mutually exclusive conditions. One is either sick or not sick. A good cure eliminates symptoms permanently. Recurring symptoms reflect a weak and poor healer; they do not reflect upon the patient.

The educational careers for learning-disabled students are not unlike the medical careers for sick people: all career paths, ultimately, are fused with the perceptions and judgments of a specialized community of individuals. The educators' judgment about handicaps depends upon the norms or learned conceptions that are shared with other professionals. Educational treatments are like diagnoses: they are rendered when evaluations show that behavior deviates from normative criteria. Then the concept of handicap becomes equivalent, sociologically speaking, with that of disease.

The equation of handicap with disease seems prevalent in the field of special education. Learning disabilities have become defined in terms of organic and neurological dysfunctions of the cerebral process. Coles (1978) concludes that experts in the field of special education have resorted to biological explanations for institutional failures,

focusing our attention, concern, and attempts at remediation on the child rather than on the social context in which the child must perform. He makes the connection (1978: 314) between the medical and the educational version of careers explicit. He finds the medical model operating in both contexts. If the specialists think there are learning disabilities in their patients, they "write authoritative diagnoses stating that . . . the children have neurological problems that impede learning. . . . Because the children have been given a set of seemingly scientific and valid tests, the conclusions must be valid. The children, now proclaimed to be learning disabled, begin the remedial path toward cognitive competence" (Coles, 1978: 314). In the school context, the designation of a handicap as either "academic" (mental) or "behavioral" (physical) is the result of decisions made by professionals, based on a series of observations and inferences, regardless of the sources of their data. Professionals validate and label behaviors and thus play an important role in creating handicaps and, by extension, handicapped school careers.

Working with individuals in educational environments inevitably entails decision making. A teacher decides whether each student is ready for long division or, more importantly, is ready to move on to the next grade. Decisions of this kind involve making predictions about a student's chance for success or failure on particular occasions. Like the classroom teacher, the school psychologist also predicts success or failure for certain academic activities that have practical consequences. Unlike the classroom teacher, however, the school psychologist calls upon a sophisticated technology of psychological and educational tests to make decisions.

Researchers of schools have long been concerned with the role of testing in making decisions about students' careers. There is a multitude of tests for numerous educational purposes. Even for a single characteristic such as mental ability, there are many tests that have different uses. If we are to accept the assertion that tests are standardized instruments that objectively measure differences between individuals, or between the responses of the same individual across different occasions, then we can readily accept the outcome of psychological assessment (e.g., a learning-disabled student) and the resulting consequences (e.g., special education placement). Before accepting the assertion that tests are standardized instruments that render decisions automatically, we should take a closer look at assessment practices.

We are not the first to raise questions about the problematic nature of testing. The procedure has a long history, both as a practice and as

an object of research. The field of standardized testing grew from the soil nourished by the early experimental psychologists who were developing psychological methods, and by the efforts of Galton in England, Goddard and Terman in America, Kraepelin in Germany, and Binet and Simon in France, to develop an objective instrument to measure individual differences in intellectual ability for educational, military, employment, and therapeutic purposes. Although an historical overview of the origins of psychological and educational testing would provide a perspective that would aid in the understanding of present-day testing practices, it is not within the scope of this chapter. Gould (1981) provides a comprehensive and readable treatment of the history of educational testing in the context of biological determinism.

Today educational and psychological tests are regarded as indispensable; they continue to play an important role in decision making about students' success or failure in school. Schools, in fact, are among the largest test users. Student face testing almost from the day they enter school, usually being exposed to the Stanford-Binet or Wechsler IQ tests, which are given to more than 2 million children each year.

Despite such wide use of testing, the case for it is hardly proved. Tests have been used for purposes far removed from their original design. Binet's original scale was a rough guide for identifying mildly retarded and learning-disabled children who needed special help; it was not intended as a device to rank normal children, nor was his scale intended to designate what it measured as "intelligence" or any other reified entity (Gould, 1981: 155). Countless articles have been written about the cultural bias and norming of educational tests. Most tests have been standardized on the middle class and the non-handicapped. Hence they are inadequate for individuals diagnosed as having different needs and opportunities for learning from the majority and whose individual characteristics create barriers to test administration and interpretation. Critics claim that the tests are often misused to track black and other minority children into inferior programs. There has been a call for a moratorium on intelligence testing, the replacement of IQ tests with criterion-referenced measures, and the elimination of tests altogether.

Even the most faithful proponents of testing share a concern with its critics. Individual tests of intelligence and achievement present us with difficult choices concerning their meaning and validity. Arthur Jensen (1969: 183), a staunch supporter of testing, illustrates the problematic nature of intelligence tests:

When I worked in a psychological clinic, I had to give individual intelligence tests to a variety of children, a good many of whom came from an impoverished background. Usually, I felt, these children were really brighter than their I.Q. would indicate. They often appeared inhibited in their responsiveness in the testing situation on their first visit to my office and when this was the case, I usually had them come in two or four different days for half hour sessions with me in a 'play therapy" room in which we did nothing more than get better acquainted by playing ball, using finger paints, drawing on the blackboard, making things out of clay, and so forth. As soon as the child seemed to be completely at home in this setting, I would retest him on a parallel form of the Stanford-Binet. A boost in I.Q. of 8 or 10 points or so was the rule. . . . I would put very little confidence in the single-test score, especially if it is the child's first test and more especially if the child is from a poor background and of a different race from the experimenter.

This commentary points out nicely the possible significance of the tester-student-environment relationship, especially when tester and student don't share ethnic or cultural backgrounds.

The materials for our analysis were collected over a period of one year. From December 1978 through December 1979 we videotaped 20 testing sessions between two school psychologists and eight "referred" students. The videotapes of psychological and educational assessment sessions were viewed by the psychologists who had administered the tests, and informal interviews were held during the viewing sessions. The 20 "hours"* of testing and subsequent interviews with the psychologists became our database for analysis.

To protect the original data tapes, we made duplicate tapes that were used in our treatment of the data. The audio portion of each testing tape was re-recorded separately on audio cassette tapes for the purpose of transcription. After the audio portion was transcribed, it was checked against the videotape for accuracy. At this time nonverbal behavior (e.g., when a test required that the student point to something) was indicated in the draft transcript. Speakers' identities, the running time of each hour at 15-second intervals, and the length of pauses were also added. Some talk that had previously been unclear became clear when viewed in its context.

The first step in analyzing the materials involved locating recurrent activities in the testing sessions. Testing encounters were generally composed of informal openings, the administration of individualized

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*The term *hour* is used for two reasons: (1) the tape for the Sony videorecorder employed most often could record for only one hour (on a few occasions we used a Betamax that could run for 2 hours) and (2) the testing sessions averaged about 1 hour each in length.

tests, and a closing of the session. This segmentation of a testing session into its component parts proved of importance in providing a basis of comparison across students and across different tests. The next step required calculation of the temporal dimensions of the sessions. We counted the length of time of formal testing and kept track of the length and number of off-task times, as well as of external disturbances. Breaches in formal testing occurred frequently in all sessions—in some, as many as fourteen times (e.g., by recess bells, intercoms, someone else entering the room). In several cases breaches were directly linked to interruptions from outside the testing session.

QUESTIONS FOR ANALYSIS

We trace the career paths of two students identified by their classroom teachers as special education candidates and subsequently referred for assessment and diagnosis by the school psychologist. In analyzing these two cases, one a learning disabled student, the other a normal student, we will pursue three lines of investigation: (1) the social construction of tests, (2) the psychologist's diagnosis of students' performance, and (3) the use of diagnostic data in formal decision-making situations.

Questions relevant to the social organization of educational testing are: How are formal tests assembled? In the context of the testing event, what contributes to a student's answer (e.g., cognitive, interactional, and situational features)? How does the psychologist determine whether a student's behavior counts as a correct answer, or overall performance as evidence of an educational handicap? As to the diagnosis of students' performance: How does the psychologist identify the student's disability? What sources of information inform this diagnosis (e.g., teachers' formal reports, informal discussions, school records?). On the basis of data compiled about the student in different contexts, the psychologist must prepare a recommendation for presentation to the committee that decides the educational placement for the child. Hence, the question we ask here is: how is the information that is gathered from the classroom and the testing situation made available to decision makers and subsequently used in decisions on special education placements?

Reassembling the Formal Test

Proponents of testing describe tests as objective, standardized, and norm-referenced. In a standardized test, procedure, apparatus, and scoring have been fixed so that precisely the same test can be given to many different students on different occasions. The emphasis here is

standardization of procedure. Technically, testing kits are uniform: we found, however, that the administration of tests in practical situations is not routine. The act of testing involves a complex social relationship between tester, student, and test situation that makes the uniform and objective measure of intelligence a social activity. The examination session is as much an interaction between two individuals (tester and student) as it is an interchange of test questions and examinee responses. The child's case history, and everything that takes place from the initial encounter to the termination of the contact between tester and student, constitutes data for analysis—by both tester and researcher.

The assessment and diagnosis of referred students was ordinarily left to the school psychologist, who generally administered a psychometric battery of individual tests of intelligence, achievement, and social and personal adjustment. We found it productive to reassemble individual tests and check them against testing manuals in order to understand the manner of administering questions and scoring responses. This has enabled us to score the test responses as the tester did and ascertain the child's overall performance. Reassembling the tests also means breaking down the formal on-task sequences into analyzable units. While Sacks et al. (1974) say that everyday conversation has many two-part sequences, some investigators of the classroom have found that formal lessons seem to have a three-part structure: initiation-reply-evaluation (Mehan, 1979). Educational tests are supposed to leave the influence of the everyday world at the door. In educational testing, therefore, one would expect a two-part sequence. In a formal test, however, it comes from a built-in constraint on the tester not to give information away. This is not to say that a three-part sequence and even longer sequences do not exist, but formal test sequences consist, canonically, of question-answer pairs.

Informal opening sequences took place prior to the the first formal testing sequence so that the psychologist could "get an idea of the child's general awareness." The psychologist elicited information from the student about his family and classroom life and then asked questions of a more academic nature. The following excerpts from two different testing sessions are typical examples of this interaction.

[Transcript no. 53]

21   *Tester:* Heh, by the way, how's your brother Tracy?
22   *Student:* I don't know. He just sits around all day.
23   *Tester:* He sits around. What do you do all day?
24   *Student:* Sit around and watch television, heh.
25   *Tester:* You don't=

26   *Student:* =And go to the coin shop.

        . . .

49   *Tester:* What's the next most valuable coin that you have?
50   *Student:* I don't know. (1) An Indian head penny.
51   *Tester:* How much is that worth?
52   *Student:* (2) Two dollars.
53   *Tester:* Two dollars / .
54   *Student:* It's old. It's like—it's an eighteen-seventy.
55   *Tester:* Oh my. That was even before I was born.
56   *Student:* It's an old.
57   *Tester:* If it was um [cough] if it was made in eighteen-seventy, how old is it?
58   *Student:* I don't know.
59   *Tester:* Come on.
60   *Student:* I don't know.
61   *Tester:* Think. (2) If it was made in eighteen seventy /
62   *Student:* Then it would be one hundred years old.
63   *Tester:* Just a hundred /
64   *Student:* Hundred and (2) seventy.
65   *Tester:* Let's figure. Go on over here to my magic board [points]. Take the yellow—I mean take the red magic marker, take the lid off. Go over there and write on it. I want you to figure that out. If that penny was made in eighteen-seventy-nine, how old is that nickel?
66   *Student:* Penny.
67   *Tester:* Oh penny, excuse me.

        . . .

[Transcript no. 32]

18   *Student:* Tomorrow's my birthday.

        . . .

23   *Tester:* How old will you be?
24   *Student:* Seven.
25   *Tester:* Seven. Oooh. You're getting to be a big kid. Do you have brothers and sisters?
26   *Student:* Only one brother.
27   *Tester:* One brother. How old is he?
28   *Student:* Three.
29   *Tester:* Three. So is he *older* or younger than you?
30   *Student:* Younger.
31   *Tester:* How much younger? (5) If he's three years old /
32   *Student:* And I'm seven. (9)
33   *Tester:* If you're—he's three years old and you're seven, how much younger is he than you? Can you figure that one out? (6)
34   *Student:* About three years each.

It is evident that the tester was seeking to gauge the level at which the student could compute simple math problems. Unlike the formal

on-task question-answer sequences that we quote below, these informal preliminaries elicited information from the child's life-experiences. During these times when the student is initiating or directing the talk, he is more spontaneous and talks in longer and more complex utterances. The following exchange is from Transcript no. 53:

89 *Tester:* What time did you get up?
90 *Student:* Eight-fifteen.
91 *Tester:* Eight-fifteen. That's a good time.
92 *Student:* Well since I'm on vacation I can sleep às late as I want.
93 *Tester:* How late do you like to sleep?
94 *Student:* Sometimes till nine-thirty. (3)
95 *Tester:* My goodness.
96 *Student:* I stay up until one o'clock in the morning.
97 *Tester:* What do you do until one o'clock?
98 *Student:* Watch television all day.
99 *Tester:* Don't you get zonked out?
100 *Student:* No, heh well, last night I did. That's when I watched just the news.

Evaluative remarks, which occur more frequently during formal test sequences, usually index the first few question-answer pairs of each new test sequence. Testers seem to give this information in order to let students know that they have understood the question as intended and are answering appropriately:

5 *Tester:* The first thing we're going to do is I want you to tell me how a wheel and a ball are alike. How are they alike or how are they the same?
6 *Student:* They're both round.
7 *Tester:* Very good, Preston. [writes] They're both round. That's excellent. How are a candle and a lamp alike?
8 *Student:* They both can light up.
9 *Tester:* [writes] You're doing a good job.

The introduction of evaluations is also guided by the tester's personal impression of the child. If the student appeared unusually insecure, the tester would offer more positive evaluations throughout the testing session. According to standardized procedures, testers are not permitted to give specific evaluations in reference to particular test items (e.g., "You did that one perfectly"), but they are encouraged to give more neutral and generalized evaluations (e.g., "You're doing a fine job").

The school psychologist, however, commonly mixed positive evaluations that referred to a specific task with those of a more general nature. The point is illustrated in Transcript no. 37:

441 *Tester:* Make yours look just like that one. That is a super job, Tracy.
442 *Student:* [draws]
443 *Tester:* Wow, you're doing a fine job.
444 *Student:* [draws]
445 *Tester:* I'm really proud of you. *Beautiful!* These are excellent, Tracy. You did a
     good job on that.

The same rule does not apply to negative evaluations. In performance-related tasks (e.g., when using manipulatives), if the student does not respond correctly to the first pair of questions in a new task sequence, the tester might say, "That's not exactly right," or, "Let's try it again," as in this sequence:

625 *Tester:* Okay. Now these pictures are going to tell a picture about a *fight.*
     [displays set] I want you to put these in order so they tell a story, Kitty.
626 *Student:* Okay. [arranges pictures] (10)
627 *Tester:* Kay, you through /
628 *Student:* Umhmm=
629 *Tester:* =Always make sure that I—I know that you're through, so I'll know to
     stop. [collects set] That wasn't quite right. Now. [displays set] Here are the
     pictures in order again. Now this picture should come first.

When administering verbal-related tasks, the tester might simply say, "That's a good try" and then provide the student with the correct answer.

According to the normative theory of psychological and educational testing, a session should proceed in a metronomic sequence of tester's questions and student's answers. As Roth (1974, 1978) has noted, the process of asking a question is often complicated. Instructions and questions on the part of the tester often result in questions of clarification from the students (Transcript no. 26):

173 *Tester:* Well, what's another, uh, something else?
174 *Student:* "Something else?" What are you talking about? This—you're mixing
     me up.
175 *Tester:* Well, what is the capital of Greece? Well, let me see if I can help you a
     little more on that [she looks in manual on the table]. Hold on (   ) [Tester
     claps hands together after putting manual back on table.] Do you know?
176 *Student:* No.
177 *Tester:* Okay. [scores]

Because the stimulus is supposed to be presented in standard ways, it is imperative that the tester not add to the ideas expressed in the standard directions but simply give directions exactly as provided according to testing manuals. Though it is sometimes permissible for testers

to give cues and directions, the circumstances in which to give them are not always prescribed in detail. This is especially a problem in individual testing, where questions are given orally. On a mental-test item where the child is supposed to receive only one trial, his answer may show that he didn't understand the question. Where the test directions permit only one trial and the tester repeats the question or cues the student with additional information, sequences of the following sort were common (Transcript no. 35):

9   *Tester:* How are a shirt and a hat alike?
10 *Student:* They're both worn.
11 *Tester:* Both worn. What do you mean they're both worn?
12 *Student:* Well, they both have some—the hat got some a little bit of fluff and the shirt has all the yarn.
13 *Tester:* What do you do with a shirt and a hat?
14 *Student:* You put 'em on.

This test item is worth one point, which the student scores with his first response, "They're both worn." The tester deviates from standard practice when she asks for clarification, and consequently the student obtains a score of zero with his second attempt. A direct cue is embedded in the tester's second request for clarification, to which the student responds correctly, retrieving his original score of one point.

On some occasions, testers' mediating activity in collaboration with the student resulted in extra points. This frequently occurred when a tester cued a student instead of proceeding to the next question. Preliminary analysis shows that overall scores were increased on the average by 25 percent as a result of these modifications of standard procedure. In the following example the student's score is boosted an extra point by intervening cues (Transcript no. 42):

198 *Tester:* What's the thing to do if a boy much smaller than yourself starts to fight with you?
199 *Student:* I would say, "please don't fight with me." (2)
200 *Tester:* Would you fight?
201 *Student:* No. I would just walk away.

The student's first response, which is correct, gained him one point and did not call for any clarification on the part of the psychologist. Even had a cue been permitted, the psychologist would have only been allowed to say, "Explain what you mean," or, "Tell me more about it." Instead, she elicits from the student a very specific re-

sponse, augmenting his score with a second point. Occasionally a student lost a point as a result of an intervening cue (Transcript no. 35):

289   *Tester:* Tell me what the alphabet is.
290   *Student:* Say it.
291   *Tester:* Remember now, I just popped in from outer space and I don't know what an alphabet is. You got to tell me.
292   *Student:* You can make a name out of it.
293   *Tester:* Okay, you can make a name out it. Okay, tell me more about the alphabet. What do you mean, "you can make a name out of it"?
294   *Student:* Like you can make anybody's name. You can make anything.
295   *Tester:* Could I make a table out of it?
296   *Student:* No, you can make a word of "table."
297   *Tester:* I can make a word?
298   *Student:* Yeah.
299   *Tester:* I can make the word "table"?
300   *Student:* Yes.
301   *Tester:* Okay, Preston. I can make a word out of it. Tell me a little more about the alphabet. See, I'm still not sure. I know I can make a word out of the alphabet but I don't know what it is.
302   *Student:* It's numbers.
303   *Tester:* It's numbers / .
304   *Student:* Yes.
305   *Tester:* You mean like one, two, three, four, five, six, seven, eight, nine, ten?
306   *Student:* No. It's like a, b, c, d, e, f, g.

This extract is long enough to show the surprising amount of interaction and "social work" that goes on between the initial asking of a question and the child's final answer (Roth, 1974). Here the student achieves two points with his answer, "You can make a name out of it" and manages to keep his two points throughout all the psychologist's inappropriate queries, until he reports that the alphabet is "numbers." He retrieves one of his two points when he lists some of the letters in the alphabet in his final response.

Standard testing procedures acknowledge the need for requests for clarification of student responses. The WISC-R manual (p. 6) instructs testers as follows: "If a child's response to a Verbal item is ambiguous or incomplete, the examiner should ask him to clarify his answer. The only probes permitted are the statements 'Tell me more about it,' 'Explain what you mean,' or similar neutral remarks. . . . Many of the sample responses given in this manual include the notation (Q). When this notation appears, it indicates that the response preceding it—or a similar response—should be queried." Just as we have found that

testers improvise on testing procedures by providing cues when they are not required, we have also found that examiners modify testing procedures by not giving a cue when one is expected, as in this interchange (Transcript no. 36):

215 *Tester:* All right. Why is it important for cars to have license plates?
216 *Student:* Because if they didn't have one they wouldn't know what state they're from.
217 *Tester:* [scores response] (20) What is a criminal?

The assembly of this test sequence is especially interesting because the student's overall score could potentially change—for the worse. According to the manual, the student's answer should have elicited a cue from the tester: it is impossible to know who the student was referring to when he said "*they* wouldn't know what state they're from." It's probably safe to assume that the "they" refers to the people who have the cars with license plates. We cannot be certain what the child intended in "they wouldn't know," but it is as likely that the student meant the police or the Department of Motor Vehicles, as that he was referring to the same people with the cars. If the student was in fact referring to the police or the DMV, he would have received one point. Although he provided an ambiguous answer, the psychologist did not ask for clarification and the student lost his chance to answer correctly.

The foregoing discussion has been designed to familiarize the reader with the basic procedure for administering standardized tests. We have confirmed the findings of many previous researchers (e.g., Mehan, 1973, 1978; Roth, 1974, 1978; Mackay, 1973, 1974; and Davies, 1978) who have shown that treating test results as social facts obscures the constitutive process by which testers and students jointly produce answers in individual tests. As a result, educators and researchers do not have access to students' reasoning, which is the very activity tests were designed to measure.

The Diagnosis of Students' Performance

In order to investigate the diagnostic process and to examine the way information is used to make decisions about students, we present case studies of Preston and Kitty. They illustrate how students' identities (as educationally handicapped or as normal), which are formed starting in the classroom, are sharpened by diagnosticians and are finally confirmed by placement committee members. This confirmation process has two components: (1) locating the disability and (2) searching for hidden disabilities.

Preston, a seven-year-old boy in first grade, was referred in September, 1978, for three reasons: behavioral problems and poor peer relations, reading at the pre-primer level, and visual-motor dysfunction. On four days in February the school psychologists administered an extensive battery of tests to Preston—all consistent with the teacher's referral reasons: (1) personality inventory; (2) academic; and (3) visual-motor and visual-perception. This consistency between type of test and referral reason was apparent for all the children tested in our study. The psychological and educational testing was clearly not the automatic administration of a prespecified battery of tests. It began with a judicious choice of instruments, suited to the referral history of the student (see Table 4). Tailoring test administration to the perceived educational problems of the referred students resulted, however, in a "test until find" approach to educational testing. School psychologists administered tests until they located the disabilities that teachers had indicated by their original referral. When they "found" verification of the referral reasons, they did not continue to administer educational tests in order to find discrepancies in the original formulation of the student; they just stopped testing. One of the school psychologists, in a viewing session, provided a rationale for this practice (Tester Interview no. 32, p. 18): "When a child is referred to me, it's hard to look at the whole picture because I'm constantly looking at why this child was referred to me, what's going on . . . what it is that's going wrong, or what is this child doing that's not right, rather than what's this child doing that's right."

If the first set of tests did not uncover the disability suggested by the classroom teacher, then the school psychologists initiated a search procedure to find this hidden disability. This was the case with Kitty, a seven-year-old girl in second grade, who was referred by her classroom teacher because she was performing below grade-level primarily in reading and language arts. At the time of the referral the classroom teacher was considering four placement options for Kitty: (1) retain her in 2d grade for the following school year; (2) place her in a learning disability group, a part-time pullout special education program; (3) have her work with the school's reading specialist on a part-time basis; or (4) place her in the multiple-handicapped special education classroom.

The classroom teacher felt that Kitty's reading problem was a result of a visual dysfunction, a "lazy eye," which required her to wear an eye patch for lengthy periods of time. During a viewing session of the classroom videotape, the teacher reported (Teacher Interview no. 54, p. 40): "Basically, in first grade she couldn't see very well and there-

TABLE 4

Referral Reasons and Test Profile

(rank order within columns; some tests administered twice)

Test	Shane (9): SELFCON, V-M DYS READ	Rodger (9): V-P DYS, EMO, READ	Preston (7): BEHAV, READ, V-M DYS	Tracy (7): EMO, SELFCON, READ	Zane (8): READ, BEHAV	Kitty (7): READ, LANG, ACAD	Robard (9): EMO, READ, COORD
Write name	–	6	7	4	1	1	18
WRAT							
Spelling	b	7	8	5	2	2	19
Math	b	8	9	–	3	3	20
Reading	b	9	10	7	4	4	21
WISC							
Information	2	–	11	–	5	7	5
Picture completion	3	–	12	–	6	8	6
Similarities	4	–	13	–	7	9	7/13
Picture arrangement	5	–	14	–	8	10	8
Arithmetic	6	–	15	–	9	11	9
Block design	–	–	16/20	–	10	12	10
Vocabulary	–	–	18	–	11	13	14
Object assembly	–	–	21	–	12	14	15
Comprehension	–	–	23	–	13	16	16
Coding	–	–	22	6	14	15	–
Digit span	10	–	25	–	16	6/17	12/17
Mazes	–	–	24	–	15	–	–
Bender-Gestalt	b	–	6/19	–	17	5	11
Motor-free visual perception test	–	4	1	3	–	–	4
Motor integration	–	–	2	2	–	–	1
Draw a person	–	1	3/5	b	–	18	2
Draw your family	7	2	–	b	–	19	3
Three wishes	1	3	4	–	–	–	–
Cat	8	–	–	–	–	–	–
Berkeley	9	–	–	–	–	–	–
Name words	–	–	–	1	–	–	–
Visual-aural development	b	–	17	–	–	–	–
Indiana / basic skills	–	–	b	–	–	–	–
Beery	–	5	–	–	–	–	–
TOTAL TESTS	15	9	26	9	17	19	21
TEST ORDER[c]	EMO	EMO	V-M	ACAD	ACAD	ACAD	V-P
	INT	V-P	EMO	V-P	INT	INT	EMO
	EMO	V-M	ACAD	ACAD	V-M	V-M	V-M
	ACAD	ACAD	INT	V-M	EMO	INT	INT
	PERS	PERS	V-P	EMO		EMO	ACAD
	V-M		PERS	PERS		PERS	PERS

[a] SELFCON, self-concept; V-M DYS, visual-motor dysfunction; READ, reading; V-P DYS, visual-perception dysfunction; EMO, emotional problems; BEHAV, behavioral; LANG, language arts; COORD, coordination difficulties.

[b] Test administered though sequence uncertain.

[c] EMO, emotional; INT, intelligence; ACAD, academic; PERS, personality inventory; V-M, visual-motor; V-P, visual-perception.

fore she didn't learn to read. I always thought that she had the capabil-
ity to read but wasn't doing it. . . . Maybe there was some sort of or-
ganic problem involved, some sort of maybe neurological problem.
She seems to be a pretty nice girl who has you know definite strengths
in math, and yet when it came to reading she just couldn't do it."

While viewing the tape, the teacher asked us to stop it at a point
when Kitty was holding her book very close to her face, "as if trying to
see it better" (p. 42). He interpreted Kitty's action to mean that this
"was just her way of really trying hard. For all I know she could see it
well from back here but um the way I interpreted her bringing the
book closer or her bending over the table was that see how hard I'm
trying, I'm really trying to do a good job. Unconsciously she was try-
ing to display her trying, to impress me." Even though the teacher be-
lieved Kitty's lazy eye impaired her sight, making it difficult to read at
times, he felt there was something else responsible for her low reading-
performance in the classroom. He referred Kitty for psychological as-
sessment in the hope that she would qualify for special education.

The school psychologist administered 19 tests to Kitty. During the
first testing session Kitty did not wear her glasses. The psychologist
readministered several of the tests during the second and third test-
ing sessions, after Kitty had acquired new glasses. After exhausting
the academic (Wide Range Achievement Tests: WRAT), visual-motor
(Bender-Gestalt), and intelligence (WISC-R) tests, the tester found no
evidence of a learning disability. Kitty performed at grade level or
better in all of the standardized tests. The psychologist next admin-
istered a personality inventory in order to uncover any evidence of the
teacher's referral reasons.

The tester could not locate Kitty's learning disability, even after 19
tests had been administered. Only then did the psychologist recom-
mend that Kitty remain in her regular education classroom and not be
placed in a special education program. It seems that only after the en-
tire inventory of tests is exhausted does the diagnostician give up the
search for the hidden disability.

This practice of searching for hidden disabilities had the (perhaps
unintended) consequence of both confirming the teacher's original
perception of referred students and substituting institutionally re-
fined designations (learning disabled) for teachers' often vague de-
scriptions ("she needs help").

A Forensic Analysis of Diagnosis

A third line of investigation that we pursued was the role that as-
sessment practices play in the diagnosis, identification, and place-

ment of handicapped students. We evaluated the textual records (e.g., teacher referral reports, test scores, and psychologists' reports) produced about the child in different contexts with respect to the interaction between the teacher and student in the classroom and the tester and student in the testing session.

In order to determine how diagnosticians come to conclusions about students' performances and then make recommendations for educational placements, we conducted a "forensic analysis" of the diagnostic process. By this we mean an examination of the relationship between clinical facts (those reported in the psychologist's written accounts, entered in the student's records and presented to decision-making groups) and behavior observed in controlled testing activities and more natural classroom situations. Just as the coroner is presented with a corpus, a body of facts, and must work retrospectively in order to construct the cause of the event, we have available to us a body of facts, a corpus of information about the psychologist's interpretation of the student's behavior in the form of "write-ups" of psychological settings. Also like the coroner, we have worked on the materials retrospectively, tracing back from the textual record of assessment situations through the line of reasoning that led to the diagnostic conclusions presented.

As researchers of schools, we are familiar with the caricature of the itinerant psychologist, WISC kit in hand, who categorizes a child as LD or EH or MR after a 50-minute test, and recommends special placement. We also know that this testing process isn't simple. The psychologist is faced with a practical, albeit complex, task in the course of her case work. She has spent countless hours in one-to-one testing, in discussions with classroom teachers, sometimes observing in classrooms, and talking with parents and other people who are knowledgeable about the child in question. She must reduce the myriad details of information to a brief, coherent report, which represents a process of analysis and synthesis of the material gathered by the examiner. The IQ of the child, as computed by the tester, is the anchor point for the development of the report and the basis for the psychologist's recommendation to the decision-making committee. The scores themselves, rather than being part of the diagnostic profile, formed the basis for making recommendations for educational placements. The report served as the psychologist's medium for describing findings and conveying impressions.

The issue that concerns us now is: How does the tester present her report? The psychologist is constrained both by cognitive limits on
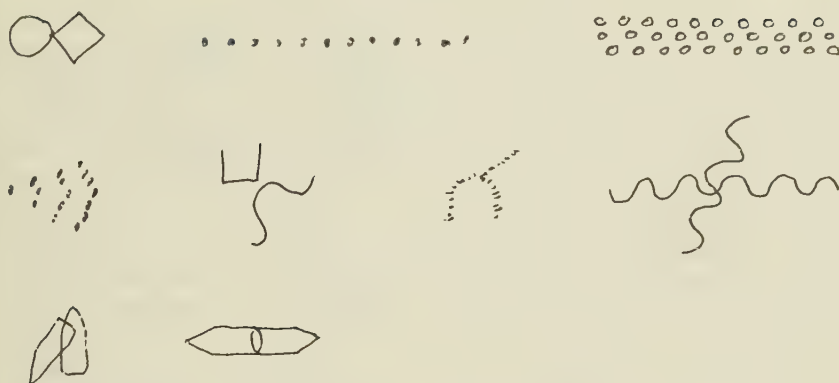
Fig. 5. Bender-Gestalt test items

human-information processing and by organizational limits on time and space. Because of the need for the tester to act within these constraints, we want to know about the kinds of information she includes in her report and, by inference, what she leaves out. Also, what is the basis for decisions to include and exclude information? Does the information reported to the decision-making committee come from the tester's encounters with the student during official, i.e., formal, aspects of the testing situation? Or does it come from the informal period prior to formal testing or even from previous discussions with teachers?

School psychologists often seek validation of the referral behavior from some indirect and circuitous sources. The school psychologist administered the Bender-Gestalt test to Preston under the heading of a visual-motor test and used components of it as an emotional indicator. The Bender-Gestalt is a well-known figure-copying test, consisting of nine designs (Figure 5). The instructions given are usually, "I've got some designs here that I want you to copy. I want you to make your designs look just like the ones on the card." On one level, the test is designed to measure visual perception and visual-motor expression skills. The psychologists used this same test, however, as part of their personality inventory. The rationale, as explained by one psychologist (Tester Interview no. 32, p. 22), was that "if a child uses all of his sheets of paper, that's considered expansion, and that's an emotional indicator of acting out and poor control. In Preston's case, he finished very quickly and that's an indicator of impulsivity. And there was a lot of real heavy and dark lines which in Preston's case may be associated with some aggression."

The psychologist also administered an informal test—"The Three Wishes"—to Preston as part of her personality inventory: what would he wish for if he had three wishes? Preston wished he "could fly," that "no one would ever bother me," and that he "could stay under water so [he] could see all the fish and stuff like that." Although the tester administered this test "just to see if he was fantasizing," her interpretation and integration of Preston's response in her written evaluation was that he was "having difficulty with interpersonal relationships, and he hasn't found a way to deal with those effectively. All he can think of is to get away and to escape" (Tester Interview no. 32, p. 14). That is, Preston was assessed as being "anxious," "fidgety," and having "poor peer relations." We have reviewed videotapes of all of Preston's testing sessions, and transcripts of viewing sessions with the tester, to determine what information led the psychologist to that conclusion. The prime factors appear to have been the student's performance during informal, off-task times, and informal tests like "The Three Wishes," which comprised only about 10 percent of the sessions, and not the formal, standardized tests administered during testing sessions.

We discovered that school psychologists' diagnostic contribution was limited. They often provided mere confirmation of, rather than insight into, the problem for which Preston was referred. During a viewing session of the videotapes of the testing sessions with Preston, the psychologist disclosed:

Yeah, but even looking at Preston now. . . . I see him differently than I remember him in my mind. One of the things I remember is him being a lot more active. And I think I'm remembering through what the classroom teacher was reporting. In terms of his classroom behavior and playground behavior, she reported that as being aggressive and him having a real short attention span and being real active in the classroom. It could be that my reflection of, my perception of Preston was more a reflection, a projection of what the teacher reported. The teacher really described him as a real problem. I mean she really described him as a rotten kid.

CONCLUSIONS

Students are first perceived as special education candidates when they are referred by classroom teachers. Although there have been no previous direct interactions between referred students and the psychologist, students do not enter the testing room with an empty slate. By testing time they have already been identified as different. Our interview and videotape data suggest that the diagnostician reinforces

the referring agent's initial suppositions about the child by recognizing apparent indicators of educational handicaps in the classroom behavior as reported by the teacher. The aftermath of such rereading of an individual is basic to the way in which the diagnostic process creates handicapped students and handicapped student careers. Embedded in the referral process, then, is a systematic confirmation process, in which students' identities are shaped as they move from regular classrooms to testing rooms and, finally to meeting rooms. It is in the diagnostic phase of the referral process that the students are literally put to the test. The psychologists pattern the administration of tests to the initial referral reasons and continue to test until they "find" the child's disability.

Diagnosticians' reports have an undeniable quality. They reflect a construction of social realities, providing statistical generalities (e.g., "He scored 5.2 on the Bender-Gestalt and 5.7 on the Berry") rather than descriptions of the student's cognitive processes. Although psychological and educational testing is a method of discovery, tests are not mechanical devices that can render decisions automatically. Nevertheless, it is test scores rather than the psychologist's discovery process that anchor the psychologist's report. And it is this report that weighs heaviest in the decision to label students educationally handicapped and place them in special education programs. Such labeling is perpetuated by mythic discourse. If someone in casual conversation calls you a "dummy," or a "genius," or tells you "you're crazy," "insane," or "brilliant," then you have been labeled—at least for the moment. On the surface—the banal level of everyday cliché—one often hears: "It's just an expression," or "It's only a myth." The cliché belittles the power of mythic discourse, although it is doubtful that the use of labels in everyday life will have significant influence in the long run.

When a child in public school is officially labeled "educationally handicapped" or "learning disabled," however, the label becomes a social fact about the child. Institutionalized labels are not just for the moment; they have consequences for the long run. The label becomes an object with a fixed meaning for the institution, albeit a social product of its own practices. At this point, the label can collapse into a metaphor. That is, referred children are restricted and limited by the boundaries established by mythic discourse.

Much like the story of the five blind men who touched an elephant and related five different renditions as to what it was, five individual children who have all been identified as "educationally handicapped" may have been placed in that educational category for five different

reasons. The fifteen students who went into self-contained special education programs (see Chapter 4, Table 2) were referred for different reasons. The EH or LD or SLH label does not automatically inform educators about the child's individual characteristics. The child placed into an LD program may have educational needs similar to those of a child in the regular education classroom. The diversity among children's needs is as great as the diversity among schools and their educational programs. An increasing number of children are being labeled handicapped and placed in special classes. A child who has been diagnosed as having poor reading comprehension or who has poor peer-relations is as likely to be placed into a special education program as a deaf child or a child with multiple physical handicaps. Legally, the labels tell us about the insitutional needs of children, e.g., how much time an LD child will spend in the regular classroom and how much time in the special education classroom. More importantly, however, official and legal labels do not tell us much about the referred child's individualized education program (IEP). Unfortunately, it is the institutional label rather than the IEP that defines the child's career through school.

On the surface, referral reasons are considered merely descriptive. They are, however, attributive and stigmatizing, and invoke certain previously established traditional and institutional standards of evaluative judgments. The teacher's original label of referred student persistently carries with it an underlying pattern for the decision maker to explain and verify. For example, the student's possession of one learning disability trait may carry a more generalized symbolic value, so that educators may automatically assume that the student possesses other stigmatizing traits allegedly associated with it.

This kind of "prospective reasoning" (Schutz, 1962; Cicourel, 1973) assumes a constant relationship between an individual event and general occurrences. At the E&P committee placement meeting (described in the following chapter), retrospective reasoning mediates. Decision makers rely heavily on inference, producing several "because" motives by taking the present information or label and formulating it in terms of a past situation. Such package-deals of retrospective-prospective thinking place the burden on the child, rather than on the teachers, testers, school, or society. This form of reasoning generates distorted syllogisms like: "Men die. Grass dies. Men are grass." Or—one that actually comes from our study—"Marc has trouble with personal relationships. Learning disabled children have poor peer relations. Marc is learning disabled."

THE DISCOURSE OF PERSUASION

The meeting of the Eligibility and Placement Committee is the culmination of the decision-making process affecting students' careers. Among the members of the group, which is convened at the district level, are the school administrator in charge of special education, the school nurse, the district psychologist, the referring teacher, and a special education teacher. The parents of the student referred are also required by law (PL 94-142) to participate in committee meetings. The principal purpose of E&P Committee meetings is to determine the most appropriate educational placement for the student referred. There are a number of placement options available to the committee: it can recommend that the student be retained in the regular classroom, be placed in one of several special education programs within the district, receive counseling, or be placed in a program outside the school district. Programs within the district can be grouped into "whole day" or "self-contained" programs and "pullout" programs. Placements in self-contained programs (Figure 2) are the most severe, because the student is permanently removed from the regular classroom. Placement into pullout programs, such as the one for learning disabled students, is less so, because the student spends part of the school day in the regular classroom and part of it in a special classroom.

In order to describe the actions of E&P committees we will (1) ascertain which decisions are reached by these committees and (2) determine how such decisions are reached. In addition, we want to see whether prevailing theories of decision making inform our understanding of the activities we observe in such meetings. Finally, we

want to see if decision making in placement meetings is similar to or differs from decision making in other contexts—those that occur naturally and those that are experimental. With these considerations in mind, let us review both individual and group theories of decision making.

THE RATIONAL MODEL OF DECISION MAKING

A prevailing view in the social sciences and within the text of the federal law that governs the education of àll handicapped students is that social organizations, and actors within them, behave according to rational rules or criteria in reaching decisions. The origins of this rational model (Allison, 1971; Benson, 1977) are in the Hobbesian conception of actors as utilitarian and value maximizing. It has been restated by Weber (1947: 115–18, 1949: 52–53), Schelling (1950), Simon (1949), Schutz (1943: 142–43), and Garfinkel (1967), among others. Parsons's (1932) delineation of the theory of action in terms of the means-end schema significantly influenced the development of this model.

The primary elements of models of rational action are (1) goals and objectives, (2) alternatives, (3) consequences, and (4) choice. The goals and objectives are the ends that the actor wishes to reach. The actor must choose among a set of alternatives displayed before him in a particular situation. Each alternative has a set of consequences or outcomes of choice that will ensure whether that particular goal or objective is chosen. Choice consists simply of selecting that alternative, the consequence of which ranks highest in the decision-maker's payoff function. As stated, this characterization is little more than an elaboration of the commonplace assumption that people's actions are goal-directed or intentional. To conceive of action as rational is to do more than treat choices as merely calculated, purposive, or strategic. What rationality adds to the concept of purpose is consistency: consistency among goals and objectives and their relation to a particular actor; consistency in the application of principles to select optimal behavior (Allison, 1971: 28–31). This element, which gives action its rational character, is handled in one of two ways in prevailing theories: as "comprehensive" rationality or as "bounded" rationality.

Comprehensive Rationality

Most theories of individual and organizational choice employ a concept of comprehensive rationality. Individuals and organizations choose the best alternative, taking account of consequences, their probabilities, and utilities. Such choices require: "(1) the generation

of all possible alternatives, (2) assessment of the probabilities of each, and (3) evaluation of each set of consequences for all relevant goals" (Allison, 1971: 71). In this formulation, "alternatives" means *all* alternatives; the "consequences" means *all* consequences that will result from the choice of any one alternative. As Watkins (1970: 206) says, such "a decision scheme should consist of a complete specification of the possible outcomes, a complete preference map, or a complete allocation of payoff values to the outcomes, and (where appropriate) a comprehensive analysis for dealing with risks and uncertainties" (cf. Schutz, 1943: 142–43; Janis and Mann, 1978: 11).

There is an "optimizing" principle (Simon, 1949; March and Olsen, 1976) inherent in the rational model. It has the goal of making the best decisions by maximizing the positive consequences and minimizing the negative consequences. Benjamin Franklin's method for making systematic use of available information before rendering a practical judgment is a prime example of this optimizing principle (Elstein et al. 1978: 25). Franklin apparently listed all the factors supporting or militating against a course of action, summed all the values in the pro and con columns, and made his judgment.

There is a remarkable similarity between the descriptions of comprehensively rational action within economics and sociology and the descriptions of formal operational thinking within developmental psychology. Both treat the actors as "scientific reasoners." Piaget depicts the development of thinking as progressing through a fixed sequence of stages, from sensori-motor through pre-operational and concrete operational to formal operational thinking (Inhelder and Piaget, 1958), the pinnacle of the sequence. The concrete operational child reasons from one element to another, with no overall structure for representing relationships; formal operational thinkers, however, are able to coordinate the functioning of parts into an integrated structure. The coordination involves the ability to construct the combination of all possibilities, to manipulate one variable at a time (while holding everything else constant), and to deal with possibilities that are not actually observed. That is, formal operational thinking is assumed to entail a cognitive structure that is fully describable in terms of the logic of the propositional calculus (Wason, 1977).

The reasoning of the actor in the rational model of formal organizations and the reasoning of the problem-solver in Piaget's model of cognitive development have analogous characteristics. Both the rational bureaucrat in a social organization and the formal operational thinker in an experiment test hypotheses by gathering all the relevant information, considering all possibilities in their entirety, and varying one

factor at a time while holding all other variables constant. That is, they employ scientifically rational forms of reasoning, solving problems in accordance with the canons of formal propositional logic.

Comprehensive rationality is sometimes employed as a norm. Actual events are explained (and criticized) as approximations of the choices made by the compehensive model. The use of the comprehensive model as a normative ideal invites invidious distinction between the decision making that transpires in naturally occurring situations and that which transpires in rational decision making or in "formal operational thinking." Everyday decision-makers are said to employ "imperfect rationality" (Watkins, 1970), or are characterized as "reluctant decision makers" (Janis and Mann, 1978).

The federal law governing special education is itself based on the comprehensive version of the rational model of decision making. Its major purpose—"to assure that all handicapped children have available to them a free appropriate public education which emphasizes special education and related services designated to meet those needs" (Sec. 601c)—is to be achieved by means of an "individualized educational plan." An IEP is developed by (1) documenting the student's current level of performance; (2) stating the goals to be obtained by the end of the school year; (3) stating the short-term, intermediate steps leading to the annual goals; (4) documenting the particular special education and related services which will be provided to the student (PL 94-142). That is, the needs of the student are to be matched to the characteristics of a special education program. The student's needs are the first and primary basis upon which decisions are made concerning placements.

Bounded Rationality

Comprehensive rationality with its optimizing principle seems to epitomize fair judgment, yet it is often unclear whether the conditions necessary for making comprehensive decisions can be met in everyday and institutional decision-making situations. In naturally occurring situations, it is often unclear precisely what the variables are or whether people consider the full range of consequences. A number of theorists, therefore, have restricted their claims concerning optimal choice by focusing on the limits of human-information processing capacity as compared with the complexities of problems faced by decision-makers. People do not make decisions by maximizing the positive consequences and minimizing the negative consequences because "determining all the . . . aspects of all feasible courses of action

would require the decision maker to process so much information that impossible demands would be placed on his resources and mental capacities" (Janis and Mann, 1978: 22). While attempting to acquire the degree of knowledge needed to anticipate alternative outcomes, the decision-maker is likely to be overwhelmed with information. "So many relevant variables may have to be taken into account that they can not all be kept in mind at the same time. The number of crucially relevant categories needed for rational decision making usually exceeds the capacity for processing in immediate memory. Handicapped by the shortcomings of the human mind, the decision maker's attention, asserts Simon, shifts from one value to another with consequent shifts in preference" (ibid.).

Shweder (1977) presses the point even further. People's performance on formal operational tasks leads him to conclude that the reasoning of well-educated Western adults is no different from that of Zande oracle readers and other primitive thinkers. Both groups ignore correlation-relevant information. This "magical thinking," he says, is an expression of a universal cognitive-processing limitation of the human mind.

In sum, the social, ecological, and psychological limits of a person's capacity to generate alternatives, process information, and solve problems can strain the decision-making process to such a degree that conformance with the comprehensive or scientific ideal is difficult, if not impossible. The gap between the ideal model and actual practice is a question of cognitive limitation; it is a failure of the individual decision-maker. Decision-makers are guilty of mistakes and errors because they cannot keep enough information in mind, or because they are inundated with information. Given these bounds, rational action requires simplified models that extract the main features of a problem without capturing all its complexity.

The Root Metaphor of Rational Action

As is the case with other concepts that structure our everyday activities, rational models of decision making in both comprehensive and bounded forms have an underlying or "root" metaphor (Pepper, 1944; cf. Lakoff and Johnson, 1980). The metaphor of rational action is composed of a set of terms that gain their meaning from their participation in a conceptual web: (1) the rational model implies that events have causes; (2) "decisions" presuppose a "decider" and a choice among alternatives with reference to some goal; (3) actions are taken by purposeful agents; (4) what is to be explained is the action,

i.e., behavior that reflects purpose or intention; (5) an action is explained by reference to the aims of a unitary actor and his goals and objectives (Allison, 1971).

In a situation of choice the individual actor is usually the unit of analysis; at the organizational level, however, the rational model of action metaphor has been recapitulated, with the organization being equated to a person. As persons in everyday life take actions that have causes, so too must organizations. Researchers studying organizational behavior, seeing actions, look for the motives behind them. Allison examined a number of analyses of organizational and governmental actions, e.g., the Cuban missile crisis, the origins of World War I, and Pearl Harbor. He found that each analysis assumes that what must be explained is an action, i.e., a behavior that reflects purpose or intention: "The actor is a national government. The action chosen is a calculated solution to a strategic problem. Each explanation consists of showing what goal the organization was pursuing when it acted, and how the action was a reasonable choice, given the nation's objectives" (Allison, 1971: 13).

The concept of rationality in organizational studies enables theorists to structure problems of choice. If they know the ends of some decision-maker, they can predict what actions will be taken to achieve those ends. They calculate the most reasonable way for the decision-maker to achieve the goals and assume that this approach will actually be taken, "because the decision maker is rational" (Allison, 1971: 50). The concept is important also because human behavior, if it is rational, can be fully explained by reference to unitary actors (Allison, 1971: 36) and in terms of the goals they are trying to achieve (Allison, 1971: 30).

THE COMMITTEE'S DECISIONS AND THE DECISION-MAKING PROCESS

Our effort to understand decision making is motivated by the belief that the process must be described as it unfolds in naturally occurring situations. The documents used in and produced during the placement meetings, and the videotape of these meetings, in conjunction with the information we have gained by observation about the placement process in the district, afford us an unusual opportunity to examine educational decision making in situ. There are four aspects of the process that emerge as especially appropriate for discussion: (1) the placement outcomes of the committee, the organization of committee meetings, and some discourse of decision making; (2) the circumstances that impinge upon committee members in their delibera-

TABLE 5

Placement Decisions by E&P Committees in Coast District, 1978–1979

Placement	Number	Placement	Number
Educationally handicapped (EH)	7	Private schooling	0
Learning disability group (LDG)	36	No placement	1
Severe language handicap (SLH)	3	Interrupted	1
Multiple handicaps (MH)	2	TOTAL	53
Speech	3		

tions, and the organizational responses to these constraints that occur before meetings; (3) the organizational practices that occur routinely during committee meetings; and (4) the chain of reasoning employed during a committee meeting.

Decision Making in Committee

Of the 140 referrals in the district during the year, E&P committees considered 53 (Table 5; see also Chapter 4). The majority of the students (74 percent) were placed into pullout programs (career paths 10 and 13); 23 percent were placed into self-contained classrooms (career paths 9, 11, 12); no students were placed in special education programs outside the district (career path 14).

The committee meetings that we observed followed a regular, four-phase pattern: (1) They were convened by either the district representative or the school psychologist in charge of the case; then each committee member who had information about the student being considered for placement made a report. (2) After these reports, the student's placement was determined. (3) Parents were then informed of their rights to private schooling. (4) The goals and objectives for the educational placement were discussed.

There are a number of striking features in the interaction among the committee members concerning the placement of students. Placement decisions were made quickly, after the school psychologist, classroom teacher, nurse, and parents had provided information about the student (phase 1). The following exchanges are representative of the interaction in the second, or "decision" phase of the meeting:

[E&P no. 33]

92 *Psychologist:* Does the, uh, committee agree that the, uh, learning disability placement is one that might benefit him?

93 *Principal:* I think we agree.

94 *Psychologist:* We're not considering then a special day class at all for him?

95   *Spec. ed. (LD) teacher:* I wouldn't at this point //
96   *Many:* No.

[E&P no. 47]

28   *Psychologist:* Okay, in light of all the data that we have, I think that the program
     we want to recommend is the learning disability group pull-out program.
29   *Mother:* Pull-out = I don't understand that //
30   *Psychologist:* For Tracy. You know, that's the program we sort of talked about
     that day, where he would be pulled out of the classroom for specific work
     on the areas that he needs, that, you know,' are identified today.

[E&P no. 57]

35   *Psychologist:* Okay. Now, okay, now then, let's, why don't we take a vote. Um,
     for the Learning Disabilities Group pull-out program. Um, is there anyone,
     anyone who does not agree? (3) Okay. I think that was unanimous. [soft
     laughter] All right. Then what we have to do now is sign. But, um, before
     we sign I'd like to have, uh, Susan, um, talk about the rights to private
     schooling and talk about your rights as parents.
36   *District rep.:* I think you probably have these two forms, but they talk about
     your rights as parents. I'm going to give you a copy anyway so, um, you are
     aware.
37   *Psychologist:* I think you received it in the mail before.
38   *District rep.:* Yeah. You probably did. I'd also like to inform you of your rights
     as parents to private schooling for Ricardo *if* the District should not have an
     appropriate program for the child. Uh, this is the law. However, under the
     same law, we feel that we *do* have a program for your child that would meet
     his needs. Okay? So I'm going to ask you to sign this form and you'll keep a
     copy and I'll sign the form too. And this is *just* only to inform you of your
     rights. Okay?
39   *Parent:* [inaudible] [signing] (8–9)

These exchanges do not have all the features routinely associ-
ated with rational decision making in either its comprehensive or its
bounded form, inasmuch as both assume the presentation of a range
of alternatives and the consideration of consequences of any choice
singly and in combination with others. One significant way in which
these activities differed from current theories of decision making con-
cerns the range of alternatives. There was no discussion of the entire
range of possible placements, and no debate, during these meetings.
At most, the possibility of placement in one or two closely related pro-
grams was considered, e.g., an educationally handicapped class-
room, or a learning disability program. The school psychologist of-
fered one alternative to the committee, without question or challenge
from other members of the committee, including the parents.

These observations point to a gap between the rational model as

conceived in the ideal, and the real decisions observed in actual practice. We seek to understand this gap and the method of reaching educational decisions that produces it. We may agree that the committee members are not reasoning like scientists, or even like Benjamin Franklin, but there is not full agreement about why this is so. We want to avoid disparaging everyday decision making by comparing it to rational models and formal logic. Instead, we seek a description of institutional decision making in its own terms, one that is consistent with participants' practices. This commitment makes our inquiry recollective. It aims to re-collect what is known by participants, albeit tacitly, in their practical activity (Mehan, 1979: 173–76; Heap, 1980).

The Practical Circumstances of Institutional Decision Making

Questions of procedure come immediately to mind: What discursive and organizational arrangements provide for this manner of making decisions? How does it happen that committee members, including parents, are routinely induced to agree with school policy and come to agreement in relatively smooth and trouble-free ways? In order to come to grips with the machinery that provides for this manner of making decisions, it is necessary to go beyond the texts of the decisions themselves. As we consider the events that lead up to this phase of the meeting—the organization of the immediate problem-solving situation and the organizational features of the school system as a social institution—we find good organizational reasons for decision making in placement meetings to be structured as it is.

There are a number of economic, legal, and practical considerations that constrain placement decisions and the processes by which decisions are reached. The public law governing special education indicates that 12 percent of the school-age population will be served by special education programs. The law's compulsory thrust provides an incentive to search for, identify, and place students into special education programs in order to meet mandated quotas, and it is further reinforced by financial incentives. State and federal sources provide funds to school districts for each student in a regular classroom, and a greater amount of money for students in special education classrooms. More money is available, on a sliding scale, for students in pull-out special eduction programs, and still more for students in whole day and more severe placement programs. This additional revenue also serves as an incentive to search for students to place in special education. There are at the same time disincentives to find too many special students. Funds for special programs are not unlimited. A funding

ceiling is reached when a certain number of students are placed in one EH classroom, or with one LD teacher. No additional money is provided if more students than the quota are assigned to particular classrooms.

These circumstances constrain the educational decision-making process throughout the referral system in general and influence the placement decisions in committee meetings in particular. As a result, a number of institutional practices have developed in this district: pre-placement planning, reducing the range of alternatives, and making placements in terms of available programs, for example. Some of these practices operate prior to final placement meetings; others operate within the meeting itself.

We found that reappraisal meetings prior to the formal placement meeting (see Chapter 4) often allowed for pre-placement planning. They were occasions to prepare the paperwork needed and thus saved considerable time during placement meetings that were attended by several highly paid professionals with busy schedules. The reappraisal meetings were also viewed as an opportunity for the staff to reach a consensus before meeting with parents. The consensus could be either a gentle way of informing the parent of the child's problem, or a defensive strategy for dealing with a parent aggressively seeking expensive service outside the district.

The range of placement options potentially available to the committee is manifold (see Figure 2). Yet the committee does not give evidence of considering this entire range of alternatives; it considers a smaller range of closely related placement possibilities. A number of organizational practices operate to reduce the number of alternatives considered by the committee and—like Goffman's (1961) and Garfinkel's (1967) "management practices"—even before a formal meeting is convened.

Certain placement options, while logically possible, are for all practical purposes not available to the decision-makers during committee meetings. The option to place students in programs outside the district at district expense is not made available to the committee; it was eliminated from consideration by administrative fiat long before placement committees met because of the inordinate expense involved in out-of-district placements. The option of a separate program for mentally retarded students was likewise not available as a consequence of prior administrative decisions. The district did not establish separate classrooms for these students, but distributed them among other programs, such as "Severe Language Handicapped" (see Figure 2; career

choice 11). Given these institutional arrangements, it is not surprising to find that the MR and the out-of-district placement options were not considered by the committee during the year of this study.

The number of students already assigned to special education programs eliminates other options from consideration prior to an eligibility and placement committee meeting. Programs that are full, i.e., have reached the funding ceiling, are not available, while those that have not reached the legally mandated quota remain subject to consideration. Vagaries of the school calendar also influence the consideration of placement options. The district operated on a staggered year-round schedule that did not designate the summer months as vacation. In this scheme, regular and special education teachers who were to participate in the educational program often found themselves on incompatible track schedules, which automatically eliminated certain placement options from consideration by the committee. The "handicapped student" is thereupon influenced not only by the school calendar, but subsequently by the demographic characteristics of the student population and other features of the social organization of the school.

Once the list of logically possible placement choices has been reduced to a smaller number of actually possible choices, the committee decides on a placement for the student. The actions of the E&P committee members suggest that the final decisions are made in terms of a number of factors: the educational programs and the funds that are available, teachers' schedules, and legal requirements. Final placement decisions are not made solely in terms of the student's disability, but in accordance with the availability of categories. The committee did not first assess the student, design a program, and then search for an educational plan that matched that assessment in each and every detail.

This practice of making placements by available category contrasts sharply with the theory of the decision making inherent in special education law and rational models of action. The construction of an individualized education plan for students with special needs is envisioned by some special educators, advocates (such as the Council for Exceptional Children), and parents as a sequential process: (1) the goals and objectives for the child's education are agreed upon; (2) the services to be provided to the child are spelled out; (3) educational criteria are specified; (4) a written plan is prepared; (5) the plan is signed by the parent.

The law implies a certain temporal order for the conduct of the

placement meetings: (1) the child's present level of performance would be determined by members of the committee who have information about the child; (2) goals and objectives would be written, based on the discrepancy between the actual and expected levels of the child's performance; (3) the parents' rights to educational services, and the range of available services, would be explained; (4) the committee would reach a decision about the appropriate placement for the child, based on those goals and objectives.

In practice, this sequence of events was not followed in the E&P meetings that we observed. The actual order of events was (1) the presentation of information by committee members, same as no. 1 above; (2) the placement decision, no. 4 above; (3) explanation of parents' rights, no. 3 above; and (4) the writing of goals and objectives, no. 2 above. Such variation between the expected and the actual order of events in placement meetings demonstrates that the goals and objectives for the individual child were not written first and the services then suggested to meet these goals. Instead, placement was selected in the context of available services.

The sequence of the explanation of parents' rights—after the placement decision, but before the goals and objectives were written—was particularly telling in this regard. The district representative's statement was typical of those read to parents during placement meetings: "Mrs. Ladd, if we, um, after evaluating Shane find that, um, we don't have the proper placement, the classroom available, appropriate placement for Shane, that you can request—or you have rights to private school and you can request that. We've made the decision that we do have a class available for Shane to go into" (E&P no. 33.97). The availability of an educational program had obviously been predetermined, without reference to the goals and objectives for the student. This practice effectively forecloses discussion of educational alternatives.

Organizational Arrangements Within Committee Meetings

The organization of E&P meetings complements the organizational practices that occurred earlier in the referral process. One transcript of the "information presentation" phase of a meeting in which a student, Shane, was placed in an LDG program, will illustrate this point. There are a number of striking patterns in the language of the four reports made to the committee during the initial information presentation phase of the meeting. These form-function relationships lead to a distinction between lay and professional reports. This distinction indexes the important role of language in authority relations within

the institutionalized order of the school, which, in turn, reveals some of the grounds upon which decisions are made. Speaker-format relations are but one aspect of this distinction. (See Hymes 1974 and Ervin-Tripp 1973 for the original seminal statements about the importance of form-function relationships for an understanding of language in society.)

The information that the committee obtained from the classroom teacher and the mother appeared in a different form than the information about the student from the school psychologist and the nurse, which was *presented* in a single uninterrupted report. The meeting was started by the school psychologist, who formulated the purpose of the meeting as follows:

1 *Psychologist:* Um. What we're going to do is, I'm going to have a brief, an overview of the testing because the rest of, of the, the committee has not, uh, has not an, uh, been aware of that yet. And, uh, then each of us will share whatever, whatever we feel we need to share.
2 *Principal:* Right.
3 *Psychologist:* And then we will make a decision on what we feel is a good, oh (3) placement (2) for an, Shane.

The school psychologist immediately provided the committee members with the information she had about the student:

3 *Psychologist:* Shane is, ah, nine years old, and he's in fourth grade. Uh, he, uh, was referred because of low academic performance and he has difficulty applying himself to his daily class work. Um, Shane attended the Montessori School in kindergarten and first grade, and then he entered Carlsberg-bad in, um, September of 1976 and, uh, entered our district in, uh, '78. He seems to have very good peer relationships but, uh, the teachers, uh, continually say that he has difficulty with handwriting. 'Kay. He enjoys music and sports. I gave him a complete battery and, um, I found that, uh, he had a verbal I.Q. of 115, performance of 111, and a full scale of 115, so he's a bright child. Uh, he had very high scores in, uh, information, which is his long-term memory. Ah, vocabulary, was, ah, also, ah, considerably over-average, good detail awareness, and his, um, picture-arrangement scores, he had a seventeen, which is very=high //
4 *LD teacher:* Mmmm.
5 *Psychologist:* =very superior rating, so he, his visual sequencing seems to be good and also he has a good grasp of anticipation and awareness of social situations. Um, he (5) [she is scanning her notes] scored in reading at 4.1, spelling 3.5, and arithmetic 3.0, which gave him a standard score of 100 in, uh, reading, 95 in spelling, and 90 in arithmetic. When compared with his *overall* score, it does put him somewhat, ah, below his, you know, his capa-

bilities. I gave him the Bender-Gestalt [clears throat] and he had six errors.
And his test age was 7-0 to 7-5 and his actual age is nine, so it, uh, he was
considerably beneath his, uh, his uh, age level. (2) His, I gave him the, uh
VADS and his, um (5 or 6) [looking through notes] both the oral-aural and
the visual-written modes of communication were high but the visual-oral
and the oral-written are l:o:oh, so he, uh, cannot switch channels. His
expressive vocabulary was in the superior range (6). Uh, visual perception
falls above age level, so he's fine in that area (6). And fine motor skills ap-
pear to be slightly lower than, uh, average, [voice trails off slightly], I saw
them. (3) He read words very quickly when he was doing the academics,
but I didn't see any reversals in his written work. Uh, I gave him several
projective tests and, um, the things that I picked up there is that, um he
does possibly have some fears and anxieties, uh (5). So I had felt ah, that
perhaps he might, uh, uh, benefit, um, (3) from special help. He also was
tested, um, in 1976 and at that time he was given the WISC-R and his I.Q.
was slightly lower, full scale of a 93 (3-4). His, um, summary of that evalua-
tion, uh, was, uh, he was given the ITPA and he had high auditory recep-
tion, auditory association, auditory memory. (2) So his auditory skills are
good. (3) He was given another psychol-, psychological evaluation in 1977.
He was given the Leiter and he had an I.Q. of 96 (6). And, um (3-4) they
concluded that he had a poor mediate recall (2), but they felt that was due to
an emotional overlay and they felt that some emotional conflicts were, uh,
interfering with his ability to concentrate.

At the end of this presentation, the psychologist asked the student's
teacher to provide information:

5   *Psychologist:* Kate, would you like to share with u:s?
6   *Classroom teacher:* What, the problems I see ( ) Um . . .
7   *Psychologist:* Yes.
8   *Classroom teacher:* Um. Probably basically the fine motor types of things are
    difficult for him. He's got a very creative mi:ind and expresses himself well
    ( ) orally and verbally and he's pretty alert to what's going on. (2) Maybe a
    little bit *too* much, watching *every*thing that's (hh) go-ing (hh) on, and finds
    it hard to stick to one task. And *mostly* I've been noticing that it's just his
    writing and things that he has a, a block with. And he can rea:ad and com-
    prehend some things when I talk to him, *but* doing independent type work
    is hard for him.
9   *Principal:* Mhmmm, putting it down on p:a:p:e:r.
10 *Classroom teacher:* Ye:a:h, and sticking to a task //
11 *Principal:* Mmhmmm //
12 *Classroom teacher:* = and getting it done, without being distracted by (heh-
    hehheh)
13 *LD teacher:* How does he relate with what the other kids do?
14 *Classroom teacher:* Uh, very well [slight stress]. He's got a lot of frie:ends, and,

uh, especially, even out in the playground he's, um (3), wants to get in on the games, get on things, and is well accepted. So::, I don't see too many problems there.

In this sequence, the classroom teacher was beginning to present some of the characteristics of the student, and was interrupted by the principal before the special education (LD) teacher took the floor. From that point on, the special education teacher asked the classroom teacher a series of questions about the child's peer relations, reading level, performance in spelling, and math. The school nurse also questioned the teacher as to how she handled the reading problem:

15 *LD teacher:* What is his present reading level, in the classroom? Instructional level?

16 *Classroom teacher:* Instructional level? Um (3), is about middle third grade, with getting the comprehension skills, etc. He's a good *reader*, but as far as comprehending it and being able to recall sequences of a story and things like that //

The LD teacher interrupted to ask a direct question about the cause of the student's difficulty in recall and comprehension:

17 *LD teacher:* =Do you feel that's due to his inattention as opposed to his inability to remember what he has read?

18 *Classroom teacher:* I'm not sure really what it (hehhehheh) boils down to.

At this point the LD teacher singled out phonics and word-attack skills:

19 *LD teacher:* But he has good phonics? Word-attack skills that kind of //

20 *Classroom teacher:* =Mhmmm //

The search for the cause of the student's difficulty shifted to another academic area, spelling:

21 *LD teacher:* =What about spelling, =does he:::

22 *Classroom teacher:* Um:: If he studies his spelling and concentrates on it he can do pretty well, but he does have some problems with like final, you know, silent E's and things like that. But usually, and on his weekly list, if he's =if I can tell that he's worked at it and studied on them it seems that :://

The LD teacher then zeroed in on the administration of the weekly spelling test:

23 *LD teacher:* Mhmmm, does he have difficulty in writing down, and keeping up with the rest of the class? When you're giving the spelling test, is that a problem?

24 *Classroom teacher:* Yea:ah, because he has a problem with writing, and it slows
      him down. Or it's if he rushes to try and, and get it down //
25 *LD teacher:* =He makes mistakes.
26 *Classroom teacher:* =Right, right. Or you can't read it (hh). He's really trying to
      ://

The LD teacher introduces a new topic, the student's performance
in math:

27 *LD teacher:* =What about in math?
28 *Classroom teacher:* Um:m (3) We're working on =he's got his multiplication
      tables down pretty well, but *not* as *quick* as I'd like to see him have them. It's
      kind of a drawback for him. But he seems to enjoy math and: it's hard for
      him to copy down problems. If he's given a sheet where he can fill in an-
      swers and work them out he does much better.

The nurse reintroduced the topic of "handwriting":

29 *Nurse:* ((Ok)). How have you handled the writing problem? Have you had him,
      like redo papers or did you just notice that this was just really hard for him?
30 *Classroom teacher:* Yeah:ah: A couple of times I've had him redo them if I think
      that it's something that if he just take a little more time at he could do a
      better job. If it's just totally a rush job I can kind of tell what that is (   ).
      Would you like to try to work this over a little bit? And he *will*, and it'll get
      so I (hh) can read (hh) it at least. But he does have a real problem with that
      but doesn't seem to want to be excluded from it, he enjoys, he seems to
      enjoy handwriting and *wants* to learn it.

After the school psychologist moved the discussion away from
these academic concerns to a more personal one—how the sutdent
handles failure (turn 40)—the questioning shifted to the mother:

46 *LD teacher:* How do you find him at *home* in terms of using his fingers and fine
      motor kinds of things? Does he do //
47 *Mother:* =He will. As a small child, he didn't at all. He was never interested in
      it, he wasn't interested in sitting in my lap and having a book read to him,
      any things like that //
48 *LD teacher:* =Mhmmm
49 *Mother:* =which I think is part of it, you know. His, his older brother was just
      the opposite, and learned to write real early. *Now* Shane, at night, lots of
      times he comes home and he'll write or draw. He's really doing a lot //
50 *LD teacher:* = (   )
51 *Mother:* =he sits down and is writing love notes to his girl friend (hehheh).
      He went in our bedroom last night and turned on the TV and got out some
      colored pencils and started writing. So he, really likes to, and of course he
      brings it all into us to see //

52 LD teacher: =Mhmmm //
53 *Mother:* =and comment on, so I think, you know, he's not NEGAtive about //
54 LD teacher: =no //
55 Mother: = that any more //
56 *LD teacher:* =uh huh.
57 *Mother:* He was before, but I think his attitude's changed a lot.

These transcripts are representative of the manner in which information about the student was made available to the members of the committee by the psychologist, the teacher, and the mother. The information from the nurse and the psychologist was presented in a single, uninterrupted report, while the mother's information was elicited from her by other members of the committee. In fact, the classroom teacher's presentation and the mother's presentation took the form of answers to questions posed by the committee members. The format of the classroom teacher's report and the mother's report differs from the psychologist's and the nurse's in another respect. The psychologist provided a summary (turn 3) of the results of a given test or subtest in a standard format. She named the subtest, reported the student's score, and gave her interpretations of the results. (Turn 5 contains other tokens of this presentational format; alternative forms are to be found in turn 3.) Perhaps because the mother and the teacher were being interrogated, their information was not presented to the committee in a standard format. For example, the teacher's statements were both general and specific (turn 8). The mother's presentation, on the other hand, consisted of lengthy answers to immediately preceding questions and were embedded in commentary on previous discussions.

The sources of information for the reports by the classroom teacher and by the mother were also different from those of the psychologist and the nurse, who relied on educational tests; the classroom teacher and mother, however, based their reports on first-hand observations. The classroom teacher's observations were of necessity confined to a relatively short temporal unit (a school year) and a circumscribed spatial and social arrangement (the classroom); the mother's observations concerned the child's actions in a wide variety of situations and spanned a lifetime. Thus, the information gathered by systematic, if indirect, observations (i.e., from specialized tests) was *presented* to the committee, but the information gathered by direct, if unguided or unstructured, observation (which included information about classroom experiences and home life) was *elicited* from participants.

The mode in which information was presented to the committee varied according to the status and expertise of the participants in the meeting. In terms of the official table of organization in the district, the psychologist and the nurse are ranked higher than the classroom teacher, and the mother has no official role in the educational system. The nurse and the psychologist work for the district office; the teacher works for one particular school. Technical expertise is coupled with this status ranking. The nurse and the psychologist have specialized degrees and are engaged in technical occupations.

The school psychologist, furthermore, has an institutionally designated responsibility, part of which is to accumulate all the information available about the child being considered by the committee. To do so, the psychologist had discussed the child with both the teacher and the mother, and had observed him in the classroom. As "case carrier," then, she has more knowledge than any single individual attending the meeting. The mother possesses information about the child at home, and the teacher's information about the child comes from observations in the classroom, but only the psychologist has all this information compiled in one place. Not only does she have more information, calibrated in terms of quantity or amount; she also has official, i.e., qualitatively different, information about the child, since she has administered official and professional tests to the child. This information is coupled with the information gathered from many other sources to compose the case.

This combination of technical expertise and organizational rank is manifest in the stratification of talking arrangements present in the meeting. The most highly technical information, from tests, was made available by the most highly trained people in attendance, while the personal observations were offered by the participants with the least technical expertise. Those of officially higher rank, speaking with an authority grounded in technical expertise, *presented* their information; speakers of lower rank, with authority based on first-hand observations, had information *elicited* from them.

Another interesting form-function relationship is evident in this phase of the meeting: a correlation between topic of discussion and speaker (see Table 6). Academic information (including educational test results, academic performance in class) is the domain of educators and is discussed by teacher, nurse, and psychologist. Emotions and feelings (including attitudes toward school and a new educational program) are the province of mothers and teachers. In fact, with one exception, the only topic that the mother is invited to comment on is the

TABLE 6

Topic-Speaker Relationships in Information Presentation Portion of E&P Meeting

Discussion topics	Transcript turn no.	Speaker	Mode of presentation
Results of educational testing	(a) 3–5	School psychologist	Reading report, informative speech act
	(b) 91	Nurse	Reading report, informative speech act
Academic performance in class	8–34	Classroom teacher	Elicitation, responsive speech acts
Student's reaction to failure	40–45	Classroom teacher	Elicitation, responsive speech acts
Student's feelings in class	58–61, 82–89	Classroom teacher	Elicitation, responsive speech acts
Student's reaction to special education	(a) 73–74	Classroom teacher	Elicitation, responsive speech acts
	(b) 71–72	Mother	Elicitation, responsive speech acts
Fine motor problems at home	46–57	Mother	Elicitation, responsive speech acts
Student's sensitivity at home	62	Mother	Informative speech act
Student's attitudes toward school	63–68	Mother	Elicitation, responsive speech acts
Student's feelings	71–81	Mother	Elicitation, responsive speech acts
Reason for problem	(a) 8–12	Classroom teacher	Elicitation, responsive speech acts
	(b) 37	LD teacher	Informative speech act

emotional aspects of the case before the committee. The exception was the topic of the student's small-motor control activities at home, which was raised after the committee had established the fact that this was the source of the student's difficulty. Thus, the mother's contribution was post hoc and not significant in reaching a decision.

The Distinction Between Lay and Professional Reports

In sum, the mother's and the teacher's reports have the following features in common: (1) their mode of presentation was elicitation; (2) they were made available by people who occupy either low-status or temporary positions* (in terms of both institutional stratification and distribution of technical knowledge); (3) their claims to truth were based on common-sense knowledge; (4) their reports were based on direct, though unguided or unstructured, observations.

By contrast, the psychologist's and the nurse's reports had the following features in common: (1) they were presented, not elicited; (2) they were presented by people who occupy high-status positions; (3) their claims were based on technical knowledge and expertise; (4) they were based on indirect, but guided or structured, observations.

We call the first "lay reports" and the second "professional reports." The distinction contributes to an understanding of the process of reaching decisions in these committee meetings. Both the professional and the lay members make claims for the authority of their reports. The differences in the authority of the professional and lay members lie in the structure and the langauge used in assembling these kinds of reports.

There is a significant difference in the way in which professional reports on the one hand, and lay reports on the other hand, are treated by other members of the committee. The reports by the psychologist and the nurse are accepted without question or challenge; those of the mother and the teacher are constantly interrupted by questions. No one asked the psychologist or the nurse to clarify the technical terms as they gave their reports, while the classroom teacher and mother were often asked to provide further information or to clarify previous statements. We have characterized the classroom teacher's report as an interrogation: she presented information, and the special education teacher, the principal, the psychologist, or the nurse asked her for further information (see transcript, turn 8). Neither the mother nor any of the educators present asked the psychologist for more details, further information, or to clarify technical terms. In fact, the mother made only one request for clarification—at the conclusion of the meeting, just as the formal business was being finished. Her question was about "P.E.":

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*Our thanks to Gail MacColl, who pointed out to us that parents, unlike all other participants in committee meetings, are temporary members.

422 *LD teacher:* Check over ((( ))   ). (5–6) I don't think I addressed P.E.
423 *Psychologist*: I don't think we, uh, *oh*, ok, we do not need that, okay, he does
        not need physical edu //
424 *Mother:* ((I want to ask something about that while you mentioned P.E. You
        mean physical education/))
425 *?:* Mmhmmm.
426 *Mother:* Does the school have a soccer program/ or is that just totally separate
        from um, you know, part of the boys' club or::—
427 *Principal:* =Right. It's a parent-organized, um, association—
428 *Mother:* Is there something at the school that would have information on it if it
        comes up in the season, because Shane really has expressed an interest in
        that?

One way to account for the differential treatment of the report, especially the differences in requests for clarification of technical terms and grounds of conclusions, is in terms of "membership." The psychologist's and nurse's statements about educational test results and their interpretations, although obscure perhaps to non-educators (i.e., researchers), are in fact comprehensible to the participants themselves. What seems to be a problem for outsiders is not a problem for members of this particular community.

That explanation does not hold, however, for the mother's inquiry about the meaning of the expression "P.E." If the technical terms used in this meeting were to be ranked in order from the most technical to the most ordinary, then "P.E." would appear closer to the ordinary than terms like "VADS," "Bender-Gestalt," "aural/oral channel of communication." Yet the mother requested information about P.E. and not about these other terms. Membership also does not explain why requests for clarification were directed at the classroom teacher but to no one else at the meeting. As a result of the weakness inherent in the membership explanation, we are inclined to consider another possibility: the authority of the professional report is inherent in the very mode of its presentation. The parents and other educators do not challenge the ambiguity of the psychologist's report because the grounds to do so are removed by the presentational mode of the professionals' report.

In order to clarify this point, it will be helpful to discuss how people are said to understand each other in everyday conversation and then examine how committee members came to understand each other. Meaning is said to be negotiated in everyday discourse. Both speakers and hearers take responsibility for the construction of understanding. According to observers from a wide variety of perspectives a first maxim of conversation is that speakers will speak clearly; they intend

to make sense and be understood. Hearers contribute to meaning in discourse by making inferences from the conversational string of utterances. They display their understanding actively through "back channel work" (Duncan, 1972), which includes eye contact, head nods, and vocalics such as "uh huhs" and even lexical items like "I see," or "I understand." When the hearer does not understand, "a request for clarification" is in order, for the manifest purpose of obtaining more information. The request is generated by the hearers when they think that the speaker is not speaking clearly.

The grounds for this kind of negotiation of meaning are removed from the committee by the institutionalized trappings and the language used in the meeting. As indicated above, the psychologist had been designated case-carrier and assembled the file on the student. The file represents the official school-sanctioned version of the student being considered by the committee. In her report, the psychologist is presenting the school's case concerning the student—the culmination of institutionalized work—and is speaking for the organization. The presentation to the committee is augmented by officially sanctioned props that include the case file itself (a bulky manila folder on display in front of the psychologist), test results, carefully prepared notes, and the fact of her designation as leader of the meeting. When she presents the case, she reads from notes. By contrast, the mother and the teacher have no such props: they speak from memory.

The grounds for negotiation of meaning are further removed by the way in which language is used in the committee. When the psychologist speaks, it is from an institutionally designated position of authority. She is making a recommendation about the next step in the student's educational career. The recommendation is based on her professional expertise, which is accorded privileged status, as displayed in the language of her report. Her clinical and technical discourse supplants the discourse of everyday life. A certain mystique is generated by the use of technical vocabulary, as evidenced by the high status that the specialized language of doctors, lawyers, and businessmen is given in our society. Its use implies a superiority and a special knowledge based on long training and specialized qualifications.

When technical language is embedded in the institutional trappings of the formal proceedings of a meeting, the grounds for negotiating meaning are removed from under the conversation. Because the speaker and hearers do not share membership in a common language-community, hearers do not have the expertise to interrupt or to question. To request a clarification of the psychologist, then, is to challenge

the authority of the official position of the district and its representative concerning the child being considered by this committee. The hearer is placed in the position of assuming the speaker is speaking knowledgeably, although he may lack the competence to understand. When technical language is used, the guise of understanding remains, even though the possibility for active negotiation of meaning seems to be removed. Yet the understanding is passively achieved, not actively as associated with everyday discourse. Instead of signaling a lack of understanding by tacit devices such as back-channel work and by manifest ones like requests for clarification, the committee members (including the parents) remain silent, thereby implicitly contributing to the guise that understanding has been achieved.

Diagnostic Reasoning in a Naturally Occurring Situation

The committee's interrogation of the classroom teacher is instructive to us because it informs us about the reasoning process committee members use to determine the source of the student's disability, and gives us insight into the educators' cultural theories about the cause or origins of students' educational problems.*

You will recall that the classroom teacher was asked to report on Shane after the psychologist made her report. First the principal (turn 9), and then the special education teacher (13), interrupted with a series of questions; the school nurse (29) and the psychologist (40) also participated in the questioning. The special education teacher's questions seem to be directed toward uncovering the source of the student's difficulties. By a reasoning process that involved sorting through competing hypotheses and simultaneously eliminating undocumented ones, the committee later reached the conclusion that "small-motor coordination" was a major source of the student's difficulties. The locus of the difficulty is thereby placed inside the child. This conclusion is arrived at by a pattern of questioning that partitions the life-space of the student into smaller and smaller units, until the exact spot of trouble is located.

It is significant in this regard that the first topic of questioning concerned "peer relations" (13). The question—how the student related with the others—simultaneously establishes two inside-outside dichotomies (Laing 1967), one of them pivoting on the child, the other on the school. The source of the problem may lie inside the child (in the form of his mental states, academic performances, motivations,

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*Peg Griffin and Bill Teale provided many valuable suggestions about discourse processes and reading theory that assisted this analysis considerably.

and the like), or outside (in the situation surrounding) him. The school is the fulcrum of the other duality, in which the source of the problem lies either in the school (the educational context), or outside the school (in family and friends). The choice of the first dichotomy is significant because of what it includes and what it excludes. Excluded from consideration as causes of the problem are schooling as an institutional arrangement, oppressive class relations, and other "structural" arrangements (Bourdieu and Passeron, 1977). The first choice, then, is an indication of the cultural theory informing the committee members in their deliberations. The educators' cultural theory suggests that situations and individuals, not structural and institutional arrangements, are possible causes of the student's success and failure. The teacher's response to this question, "He's got a lot of friends" (14), provides the committee with the evidence to discount the "outside," i.e., social or situational choice in the dichotomy.

The special education teacher then concentrates attention on the "inside" of the student. Aspects of the student's performance in reading, spelling, handwriting, and math are considered, but no other topics associated with the classroom, such as art and music. From this selection we may conclude that scholastic performance in academic subjects is an important consideration in special education placement, but involvement in artistic matters is not. Inherent in this line of questioning is a chain of reasoning. An initial premise is posed, i.e., the student has a problem in the area of spelling. Second, a number of hypotheses are generated as possible sources of this problem. Next, the writing component of the spelling process is considered. When the classroom teacher supplies evidence of the student's difficulty with the act of writing during spelling tests, the questioning about this domain stops. Since the LD teacher shifts to questions in a new area, we may surmise that she has reached a conclusion, which remains unstated: that the student's difficulty in spelling is caused by small-motor control problems.

It is instructive to examine the chain of reasoning linked together by the interrogation of the classroom teacher. The committee's practical project was to search for the cause of the student's problem, which involved hypothesis testing of a special sort. It does not appear that the committee's reasoning work entailed a "falsification procedure" (Popper, 1962; Inhelder and Piaget, 1958) that would have identified falsification of hypotheses or "logic of disconfirmation"; that would require systematic testing of each variable while all others remain constant. The causes of the student's problems considered by the commit-

tee during its deliberations are: (1) social, (2) memory, (3) motivation, (4) auditory, (5) decoding, (6) fine-motor control, and (7) visual coordination. Examination of the interaction between committee members shows that each value of the small-motor hypothesis was not considered in the light of the values of all these other hypotheses. The combination of all possible hypotheses was not considered. While evidence against many hypotheses was gathered, only evidence for the small-motor control hypothesis was accumulated. Evidence that would directly disconfirm this particular hypothesis was not gathered.

The committee was not engaging in a strict falsification procedure; it was, however, not simply accumulating evidence that supported or confirmed hypotheses. It did not give evidence of a general "confirmatory bias" (Wason and Johnson-Laird, 1972) by using only positive confirmatory evidence, while overlooking or ignoring falsifying information.* There is ample evidence that the committee eliminated hypotheses in the face of contrary evidence (see Table 7). In fact, the majority of hypotheses were no longer considered as soon as negative evidence was presented.

The committee's form of reasoning can be called "the elimination of competing hypotheses," in the course of which a number of possible hypotheses are considered simultaneously. Those that do not accumulate supporting evidence are excluded, until only one remains. Potential sources of the student's difficulty were introduced: peer relations and the academic tasks of reading, spelling, and math. A series of questions was asked about each of the topics, one topic at a time, focused on the components of the academic tasks. Thus phonics, recall, comprehension, and word-attack skills were identified as the components of the reading task, spelling tests as a component of the spelling task, and multiplication as a component of the math task. The questions were posed to the classroom teacher and psychologist in such a way that they had to make dichotomous choices of the "either/or" variety: *either* this aspect, *or* that aspect of the child's life was the source of the difficulty.

Two (and once, three) competing hypotheses were juxtaposed each time a "forced choice" question was asked. A response that indicated a certain kind of performance on one of the tasks became documentary evidence for one of the hypotheses. Likewise, a response from the teacher that indicated a different kind of performance on the other

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*Subjects in experiments, when asked to determine whether there is a relationship among variables, tend to focus on positive co-occurrences, and not on negative co-occurrences.

task became documentary evidence for the other hypothesis weighing in the balance. In this manner, each answer by the teacher became an index of a competing hypothesis, and, no matter what it was, provided some evidence of a documentary nature about one of the two hypotheses being considered at any one time.

The committee arrived at the conclusion that small-motor difficulties were the cause of the student's problem by a reasoning process that eliminated those hypotheses that did not accumulate supporting evidence (see Table 7). Of the seven hypotheses considered by the committee, only the small-motor control hypothesis received positive evidence, which emerged during two exchanges between the special education teacher and the classroom teacher, and one between the special education teacher and the psychologist. Three other hypotheses received negative evidence (the social, motivation, and decoding hypotheses). Those that received negative evidence were eliminated from consideration. One piece of negative evidence was sufficient to eliminate these hypotheses from further consideration. Evidence adequate to test the memory and auditory hypotheses was not available. These hypotheses were in effect discounted rather than tested directly. The visual coordination hypothesis was eliminated when the special education teacher asked the psychologist about letter reversals. The answer served double duty, logically speaking: it served as evidence simultaneously for the fine-motor control hypothesis and against the visual coordination hypothesis.

In fact, many of the teacher's comments served logical double duty. When asked directly about handwriting and spelling, the teacher not only answered the question, but also provided information about the student's motivation, concentration, and determination. Her answers provided evidence explicitly against the motivation hypothesis and implicitly in support of her earlier claims about the importance of the student's self-concept. This is just one indication that many agendas are being worked out simultaneously during this meeting.

The reasoning process operated in a way analogous to single elimination tournaments used in certain athletic events. (For another use of this analogy in the decision making in educational careers, see Rosenbaum, 1976.) In the interrogation, two competing hypotheses were pitted against each other. The one that lacked supporting evidence was eliminated, and the hypothesis that accumulated evidence went on to compete against another hypothesis. The set of hypotheses without negative evidence became smaller and smaller as more and more were excluded, until there was, finally, but one survivor of

TABLE 7

Hypotheses About Student's Source of Difficulty

Hypotheses / turn no.	For[a] (turn no.)	Against[b] (turn no.)	Status
Social (3)	—	3	No longer considered; eliminated
Memory (17)	—	—	Neither rejected nor confirmed; "discounted"
Motivation (17)	—	22, 28, 30, 34	Eliminated
Auditory (17)	—	—	Neither rejected nor confirmed
Decoding (19)	—	20	Eliminated; no longer considered
Fine-motor control (23)	24–26, 28, 35[c]	—	Accepted
Visual coordination (34)	—	35[c]	Eliminated

NOTE: Turn numbers refer to the numbered statements in the transcript on pp. 121–25.
[a] Evidence used to support a hypothesis that is accepted.
[b] Evidence used to reject a hypothesis that is presented.
[c] Served simultaneously as evidence both for and against.

the elimination tournament—the small-motor control hypothesis—which the committee then affirmed.

The committee's reasoning seems consistent with findings reported by Elstein et al. (1978), who conducted an experimentally controlled study of clinical reasoning. They attempted to approximate the natural environment of medical practice by presenting a series of "high fidelity" stimulus situations to physicians and charting the course of their diagnosis. The resulting data indicate that diagnostic problems are solved in a hypothesis testing approach that is neither the approach associated with scientific rationality described in this chapter nor the magical thinking associated with everyday problem solving as reported by Shweder and others. The hypothesis testing approach resembled more closely what Tshirgi (1980) called "hold one thing at a time" than her "vary one thing at a time." The physicians did not use a purely inductive method, gathering data until a solution spontaneously emerged. Instead, hypotheses about the cause of disease were generated early in the examining process. Physicians then had a tendency to latch on to these early hypotheses and accumulate evidence to confirm them.

CONCLUSIONS

Answers to the questions that we posed at the outset of this chapter have been found in the educators' institutional practices implemented to deal with fiscal and legal constraints. In response to the practical circumstances confronting them, the range of placement alternatives was reduced by administrative fiat and by pre-placement planning. The very way in which placement meetings were organized, and language structured within meetings, complemented these organizational practices that had occurred earlier in the referral process. Different committee members tend to come to E&P meetings with differing views of the student's case and attitudes about the student's placement. As a case in point, the several members of this committee perceived Shane differently, yet by meeting's end one version of the student prevailed: the version provided by representatives of the school district.

This discussion, if left here, would be at best an interesting example of cultural relativism in face-to-face interaction. Psychologists, teachers, and parents have different definitions of situations. These differences are assembled because a set of behaviors takes on different meanings by participating in certain theoretical and common-sense systems of belief and knowledge. Situational relativism could be the interpretation of these circumstances, except for one crucial point: the definitions of the situation held by the various members of the committee are not equal. The professionals' interpretation of the student, made in the context of institutional authority, and bolstered by the organization of the meeting and structure of language used in it, overrides lay versions of the situation. Their reports, although set forth in highly technical vocabulary, were accepted without challenge or question. The committee's methods of reaching decisions can be understood in terms of the authority that reports gain by their very mode of presentation. The psychologist and the nurse gain their authority from the mastery and use of a technical language that others do not understand and do not question. The professional report gains its status and authority by virtue of the fact that it is obscure, difficult to understand, and is embedded in the institutional trappings of the formal proceedings of the committee meeting. It is this authority that contributes to the assembly of the decisions that are presented, not "discussed"; credentialed, not negotiated.

When people have competing versions of experience, they may work to establish a commonly agreed-upon definition of the situation,

achieving consensual resolutions when one of the protagonists re-linguishes his or her experience of the world as the preferred version. In this case, the resolution was not negotiated; it was legislated. The members of the committee resolved the disjuncture between lay and professional versions by credentialing the professional version as the official version of this student. Thus, although there is evidence of the social construction of educational facts here, there is none for equal negotiation in that reality-construction process. Instead, we have yet another instance of the "politics of experience" (Laing, 1967; Pollner, 1975; Mehan and Wood, 1975: 215–18), with an institutionally sanctioned version superimposed upon multiple and competing versions of experience.

The circumstances of decision making—in the organizational sense of both the immediate problem-solving situation and the institutional features of social institutions—hold the answer to the question Why did the committee members look neither like scientists nor like magicians? Wason (1977) reviewed a set of delightful experiments that he and Johnson-Laird have conducted with the same problems presented in symbolic and concrete form. Again and again, the subjects of these ingenious experiments seemed to be influenced by the context and the content of the problems. Information presented in semantically coherent form as stories, or with real-life manifestations, consistently yields better experimental results when the same information is presented in abstract or symbolic form. A summary of these studies shows that hypothesis falsification procedures are not used as often as hypothesis confirmation procedures. If falsification information is aroused at all, it is done, not by a scientifically rational calculus, but by its assimilation to more mundane experiences. Wason's studies show that reasoning is radically affected by content in a way that is inconsistent with current thinking about formal operational thought.

In showing that people reason like scientists when presented with some problems, but fail miserably when presented with others, Wason is pointing to the influence of the decision-making situation on the decision-making process: "If adults have what Piaget calls formal operations, then Piaget has done very little to specify the conditions under which they will be observed" (Wason, 1977: 132).

The semantic content of the task is but one dimension of the problem-solving situation that has led some observers to talk about "context specific" problem solving. Other aspects of the problem-solving situation that influence subjects' performance on tests or experiments are: the language in which test items are presented to subjects; the fa-

miliarity that subjects have with test items; and the relationship that test items have to the cultural system from which subjects are drawn (LCHC, 1982a, 1982b). A less obvious contextual influence is the fact of the test situation itself. Performance on tests and experimental tasks seems to require the participants to recognize that they have been placed in a special context, characterized both by the suspension of certain knowledge about everyday life and by the assumption and use of information provided by and specific to the test domain.

LCHC (1982a, 1982b) reviewed a wide range of studies, conducted primarily in the field of cross-cultural psychology, which show that subjects' performance varies considerably from one type of problem-solving situation to another. In crude terms, well-educated Western subjects often looked smart, "reasoning like scientists," when tasks and test items were familiar, but failed miserably, "reasoning like magicians," when tasks or test materials were not familiar. The same finding was reported for uneducated non-Western subjects.

The general conclusion that was reached from these studies of context-specific learning seems to apply to this study of practical reasoning in an institutional setting. Problem solving is not a general ability, applied evenly in all domains regardless of contextual constraints. By the same token, modes of reasoning, be they formal operational, scientific, or magical, are not general forms of reasoning. If there is a scientific form of reasoning, people do not reason like scientists all the time; they will employ such modes of reasoning in some contexts but not all. Likewise, if there is a magical mode of thinking, people do not reason like magicians all the time; magical thinking will appear in some, but not all contexts of reasoning.

EDUCATORS' ACCOUNTS OF STUDENTS' BEHAVIOR

An important component of decision making about special educa-
tion students is the perceived cause of their educational difficulties. In
this chapter, we consider the grounds upon which teachers and other
school officials make decisions about referral students at each of the
key junctures of the decision-making process.

MEDIATING COGNITIVE PROCESSES

Our investigation of educators' views about the causes of students'
school difficulties is informed by work on cognitive processes in
several disciplines. A denominator common to these studies is the
recognition—at least since the turn of the century—that subjective
meaning is an important mediating influence in social life. American
pragmatists considered individuals to be creators of their environ-
ments, a view reflected in Thomas's theorem: "situations defined as
real are real in their consequences." He goes on to say, "Not only con-
crete acts are dependent on the definition of the situation, but gradu-
ally a whole life policy and the personality of the individual himself
follow from a series of such definitions" (Thomas, 1931: 41–50).

Mead (1934: 8) makes similar observations about the emergence of
mind from social life: "The evolutionary appearance of mind or intel-
ligence takes place when the whole social process of experience and
behavior is brought within the experience of any one of the separate
individuals implicated therein, and when the individual's adjustment
to the process is modified and refined by the awareness or conscious-
ness which he thus has of it."

For Weber (1947: 88) the importance of subjective meaning lay in the

emphasis he placed on "meaningful action": "we are concerned with human behavior if and insofar as the agent or agents associate a subjective sense (*Sinn*) with it." The topic of subjective meaning has stimulated considerable interest in sociology and social psychology, contributing in part to the development of entire schools of thought, e.g., those portions of "symbolic interactionism" concerned with the development of self; labeling theory; and those portions of social phenomenology and ethnomethodology concerned with the social construction of reality and accounting practices.

Information Processing and Teachers' Judgments

Another line of research that takes into account the goals, intentions, judgments, decisions, and knowledge of teachers and students has been influenced by the study of human-information processing (see Norman and Lindsay, 1972; Rumelhart and Norman, 1980). A general finding from such studies is that people are limited in their ability to process all the information in their environment. More specifically, they tend to process information sequentially rather than simultaneously, and in a very limited short-term memory (Newell and Simon, 1972). To make the environment predictable, information is chunked into more abstract units, which enables the volume processed in short-term memory to be increased (Miller, 1956). As a consequence of information-processing limitations, people selectively perceive and interpret portions of the available information (Bruner, 1957); then they construct a simplified model of reality that becomes their basis for making judgments and carrying out decisions (Newell and Simon, 1972). They use techniques like the salience heuristic to select information; the availability heuristic to recall information; the representativeness heuristic to classify; and the anchoring heuristic to revise initial judgments (Tversky and Kahneman, 1974; Norman and Bobrow, 1975; Shavelson, 1980).

A wide and growing literature exists in the general area of planning and decision making by teachers that takes this information-processing approach into account (see Shavelson, 1980, for a review). Shavelson has presented a model for teachers in which information-processing heuristics combine information about students with teachers' beliefs and conceptions to produce judgments about both students and instruction. His research shows that teachers must process large quantities of information from such varied sources as their own observations, school records, and test scores to form judgments about students. Because previous studies have shown that teachers' initial evaluations of students affects instructional decisions even when the

initial evaluation is not valid (Dusek, 1975), it is necessary that we try to understand the actual evaluation and judgment process of teachers as systematically as possible.

Attribution Theory

Attribution theorists have investigated the processes by which individuals make sense out of their environments through social perceptions and concept construction. Attribution theory is concerned with the antecedents and consequences of social perception and the processes through which we assign causes and attributes to our own and others' behavior: taking the point of view of the lay observer, the theories consider the degree and mode of categorizing, interpreting, selecting, and processing information in the social-perceptual field.

These cognitive processes are of utmost importance for an analysis of accounts given by school personnel concerning special education referral children. Most of the extensive research on attribution has been done under experimental conditions. Subjects are presented with hypothetical vignettes describing a person in a situation and are asked to respond to particular dimensions of causality or trait terms chosen by the researcher, i.e., they are asked to make an attribution about hypothetical information along dimensions provided by the researcher.

Weiner and his associates (1971; Weiner, 1972a, 1972b, 1974) have extended attribution theory into the educational domain. Utilizing Heider's four elements (ability, effort, task difficulty, and luck) as perceived determinants of achievement behavior in schools, Weiner and his associates have shown that individuals use these elements in their attributions regarding achievement-related events—as the causes of success and failure. Following Heider, Weiner classifies these causal elements along two dimensions (Figure 6; Weiner et al., 1971: 96). One dimension differentiates them in terms of their locus of control—

LOCUS OF CONTROL

		Internal	External
STABILITY OVER TIME	Stable	Ability	Task
	Unstable	Effort	Luck

Fig. 6. Stability over time / Locus of control

internality or externality. Thus, ability and effort are to be considered internal because they originate within the person; task difficulty and luck originate outside the person and are therefore considered as external causes. The second dimension differentiates causal elements in terms of their stability over time. Thus, ability and task difficulty are considered stable because they do not vary if the same task is repeated; effort and luck are considered highly unstable because they fluctuate over time.

As examples of attributions along these dimensions, we note that if a child is viewed as lacking ability, his/her educational problems are viewed as internally caused. If a child is viewed as unable to perform the task at a certain time of day, the educational problem is viewed as externally caused. According to Weiner's typology, if the child's failure in school is attributed to either of these factors, then educators would believe that there is not much hope for change, because both factors are considered relatively stable. Likewise, if a child's failure at a task is attributed to lack of effort, his/her educational problem is viewed as internal. Since effort is an unstable factor, however, it is possible for that failure to be reversed. If the failure is attributed to luck, there would be less chance of change, because luck, though an unstable condition, is outside the control of the individual.

Accounts and Semantic Relations

Related work with a bearing on our investigation concerns the critique of prevalent trait-inference theories. D'Andrade and Shweder propose that inferences made on the basis of trait-terms may be due to the semantic similarities in the meaning of terms. D'Andrade (1965) asserts that an individual's memory of an event is more closely related to the cultural expectations of "what goes with what" than to what takes place in an actual event. In a comparison of observations of small-group interactions, participants compiled one set of ratings of each other's behavior immediately following the interaction. Another set of ratings was made by the observer. Both participants' and observer's ratings were similar to each other and to the cultural expectations as measured by the similarities of the social-behavioral categories. Neither the participants' nor the observer's ratings nor the semantic similarity judgments were similar to the record of the observed event.

Shweder (1977), expanding on this theme, questions the validity of an individual-difference theory of personality; he maintains that all this theory amounts to is statements about how subjects and research-

ers classify items of like meaning. He views the tendency for trait-inferences to reflect semantic similarity groupings as a type of magical thinking. Magical thinking is an expression of a universal disinclination to "draw correlational lessons from experience," and a universal inclination to seek symbolic and meaningful connections among events. This magical thinking is an expression of a cognitive processing limitation of the human mind. As such, it is characteristic of both primitive society and industrialized society.

This, and related work (Mischel, 1968; Cantor and Mischel, 1979), is important in that it augments questions raised in attribution theory concerning the relationship between the behavior underlying the attribution and the attribution itself. D'Andrade, Mischel, and Shweder are challenging the tenet of trait and personality theories, that attributions index underlying conditions. For them, the dispositional consistency does not lie in persons or their environments. Rather, it lies in the labels used to describe persons or their environments. These theorists take consistency out of the personality of the individual and place it in the semantics of the language used to describe people.

Within the framework of these theories, we will consider the motivational, perceptual, and conceptual components of educators' judgments about the causes of students' behavior. This approach enables us to assess more fully the judgmental work of school personnel as they refer students, identify them as educationally handicapped, and place them into special programs for remediation.

INTERVIEW ANALYSIS

The experimental study of hypothetical information using researchers' categories is not necessarily related to the process by which individuals actually make attributions in naturally occurring situations. We felt that the cognitive aspect of the decision-making process would become more evident if we focused on the interpretive accounts given by school personnel in interviews and decision-making meetings. In order to determine educators' views about the causes of students' school difficulties, portions of the viewing sessions with educators have been analyzed for statements characterizing students and their academic difficulties.

We have interviews with 27 teachers who referred 55 children; 6 interviews with psychologists about the educational testing and diagnostic situation; 3 transcripts of decision-making committee meetings; and 3 interviews with members of those decision-making groups. Interviews with the educators were lengthy, far-ranging, and complex,

and generated a wealth of material. We aimed for an analysis that is comprehensive and that captures the educators' perspective on the educational and referral process. Although interview material was summarized, the transcripts have been indexed and retained. The interview questions are presented in Chapter 5. Each interview was tape-recorded and transcribed. Each educator in the study is identified by a number, thereby preserving anonymity. Each line of the transcript is numbered, and each transcript is summarized, with cross-references to the transcript line-numbers for easy retrieval of the source materials.

With few exceptions, the interviews consisted of two major parts. The first part covered a wide range of topics, i.e., optimal school or classroom organization, curriculum, the special education referral process, children who are referred, and attitudes toward the research project. We refer to our analysis of it as a "context analysis." The second part centered around the educators' viewing of, and commentary on, the videotape in which they were involved. The first part of the interview was done in typical open-ended question-answer format; the second part was unique in its use of the videotape to document the behavior of children in classroom lessons. We were able to obtain the teachers' reports of lessons in which the children were engaged as well as their indication of occurrences of referral behavior. We refer to the analysis conducted on this part of the interview as "the analysis of educators' accounts."

In order to provide a context for the analysis of educators' accounts, each interview was summarized according to three distinct topics:

1. Educators were asked to give their views on the special education referral system and to describe the process in detail; to state their criteria for referral and their past and present experiences with the referral system. In addition, they were asked to discuss their knowledge and expectations of the process, the results of prior referrals, and their expectations of the referral process.

2. The reasons each teacher gave for referral were of particular interest to our study. Analysis of this topic allowed us to examine the reasons given on the official school district referral forms, and to get an expanded version of the teacher's official reasons for referring a child.

3. Educators were asked to discuss their conceptions of education, classrooms, and students. They were given an opportunity to discuss ways in which they would like to see classrooms organized. They were asked to make comparisons between ideal classrooms and existing classrooms, between ideal students and poor students.

Prior to actual viewing of the videotape, educators were given an opportunity to state their feelings about the videotaping and to brief the interviewer on the event to be viewed. Next, they identified the children on the tape for purposes of discussion and transcription of voices. Then, they were given specific instructions for asking the interviewer to stop the tape (see Chapter 5 for details). This part of the interview, the actual viewing session, forms the backbone of the analysis of educators' accounts of students' academic performance, which focuses on the educators' descriptions of the referred child and his/her behavior. It also compares the referred child with other lesson participants.

Once the transcript was summarized and indexed, it served as a basis for the analysis of educators' theories about success and failure. The transcripts were searched for all statements that educators made about students' school performance. These statements, when isolated, extracted from the transcripts, and labeled with a transcript line-number, became the materials upon which the analysis was conducted.

We tried to apply coding schemes used in previous attribution studies, but it quickly became clear that they would be inadequate for our materials. In the studies from which these codes came, educators had been asked to comment on hypothetical educational situations, using categories provided by researchers. The codes proved insufficient for our purposes because the educators in our study provided varied and numerous descriptions that went beyond the small number and limited scope of coding schemes in experimental studies. By moving back and forth between the materials and an emerging analytic scheme, we developed a more comprehensive set of coding categories, with a set of 20 factors that encompassed the full range of educators' accounts about success and failure. These factors may be grouped under three headings as follows: (1) *internal factors* (ability, effort, cognitive focus, physical state, psychological state, trait, behavior, intrinsic motivation, task disposition, and miscellaneous); (2) *external factors* (extrinsic motivation, others' assistance, others' negative action, others' traits, lack of external factors, impersonal external, task difficulty, and miscellaneous); and (3) *internal/external factors* (ability-task and miscellaneous).

EDUCATORS' THEORIES ABOUT FAILURE

As assumption underlying trait-theory and prevailing personality theories is that descriptions index underlying traits of people. There is a stable set of invariant conditions beneath trait-terms. The warrant for this claim includes personality research, which shows that considerable consensus can be achieved by observers assigning personality

characteristics to the same actor (Allport, 1961). This perspective made the question relevant for our study: are educators consistent in the ways in which they account for student success and failure? If they show diversity in their accounts, this may indicate that they have particularistic or individualistic theories of student performance that bear little relation to one another. If educators account uniformly for student referrals, this may indicate that they as professionals have a common theory of success and failure.

We addressed this issue in a number of ways. First, 15 teachers' descriptions of 31 students referred for special education were analyzed. The accounts given for students' success and failure were coded according to the 20 categories identified, which then were ranked in the order of their frequency of occurrence. The Kendall coefficient of concordance (Siegel, 1956: 229) was used to determine whether there was agreement between the teachers on the rank order of the frequency of attributions. The analysis shows that teachers account for student success and failure in similar ways, though they were not always in perfect agreement. A few differed widely in the number, type, and resultant rank ordering of their reasons. Overall, however, the agreement of teachers' attributions was statistically significant.

Table 8 lists the frequency with which teachers make certain types of statements about the causes of students' classroom difficulties. Students' ability is the most important factor for teachers in assessing difficulties and also in referring students to special education. This concern takes the form of comments about a child, e.g., being "two years behind in reading," or having an "articulation problem," or "his ability level." The second most frequently cited reason for students' difficulties was behavior. Among the behavioral causes, teachers cited the following: "He's usually out of his seat"; "he will argue with you"; "he socked somebody." The next most frequently cited reason was students' psychological states, which teachers defined with such statements as, "He's always in a bad mood," "he's feeling persecuted," or "he withdraws."

Note that the most common locus of these reasons for referring students is internal to the students. External factors (e.g., conditions at home, motivational assistance from parents) were cited infrequently, as were more complex causal statements (e.g., some combination of factors to be found at home and factors internal to the student). Teachers were much more negative than positive in their descriptions of students.

TABLE 8

Rank-Order Frequency of Attributions

Category[a]	Pct.	Category[a]	Pct.
Ability (i)	23.6%	Miscellaneous external (e)	3.1%
Behavior (i)	14.7	Others' assistance (e)	2.4
Psychological state (i)	11.5	Intrinsic motivation (i)	2.2
Trait (i)	7.8	Miscellaneous internal/	
Cognitive focus (i)	5.5	external (i/e)	2.2
Task disposition (i)	5.3	Ability/task (i/e)	2.0
Physical state (i)	4.2	Impersonal external (e)	1.9
Effort (i)	3.8	Lack of external factors (e)	1.6
Miscellaneous internal (i)	3.8	Others' negative action (e)	.7
Extrinsic motivation (e)	3.3	Others' traits (e)	.6
		Task difficulty (e)	.1

[a](i), internal factors; (e), external factors; (i/e), internal/external factors.

Having observed a degree of generality in teachers' views about the cause of students' difficulties in schools, we examined the influence that their attributions have on students' placements. Possibly the way in which teachers account for failure will be linked to eventual placement in the special education program. For example, if teachers see the cause of academic difficulty to be the result of students' inability or effort, will those students be placed differently in the system than others whose teachers see their difficulty to be the result of external factors (e.g., home or situational factors)?

The impetus for this line of thinking came from Carroll and Payne (1977), who analyzed judgments about crime and the criminal by using the internality/externality dimension of attribution. They found that a person will be perceived as responsible for a crime to the extent that a criminal act is attributed to his internal qualities. They also found the corollary to be true: a person will be perceived as less responsible for a crime to the extent that the criminal act is attributed to situational factors. Actual punishments were shown to be distributed along these same dimensions. Punishments meted out to the criminals who were seen as responsible for the crimes were more severe than to those who were considered less responsible. Although placement in a special education program cannot be equated with punishment, we wanted to see whether parallels can be drawn to the importance of the internality/externality attribution. If school personnel attribute problems to internal factors of the child, will the prediction

about placement and the actual placement be more severe than if the attribution is made to external factors? That is, will external attributions be linked to in-class treatments or pullout programs, and internal attributions to whole-day, self-contained special education treatments?

Since there were gender differences in referrals, only cases concerning boys were used in this assessment. The least severe placement was "no assessment recommended"; next, "tested and returned to the classroom"; then, "returned with remedial help"; and, most severe, "LDG." We found no support for a relationship between teachers' attributions and students' final placements. Regardless of whether students were placed in whole-day educational programs or in part-time pullout programs, or stayed in classrooms with some sort of remedial help, teachers talked about students' difficulties in the same way. Students' ability, behavior, and psychological states were the most important reasons for their difficulties. Indeed, the seven most frequently cited reasons for students' academic difficulties were closely aligned (Table 9). This means that students who are institutionally defined as LD or EH are not conceptualized differently by teachers than students who are institutionally defined as normal. Teachers both conceptualize and talk in the same way about students institutionally defined as normal as about those students institutionally defined as having learning disabilities.

We also investigated whether teachers account for the school performance of boys and girls differently. A number of experimental studies have shown that sex stereotypes appear to operate in schooling situations in the attribution of success and failure (Feldman-Summers and Keisler, 1974; Etaugh and Brown, 1975; Dweck and Gilliard, 1975). Typically, female success is attributed to motivational factors (effort, luck, and easier tasks)—male success to ability factors. Female success is thereby disparaged, because failure attributed to low motivation does not reflect on ability. The implication is that greater motivation would bring success to a similar task. However, when failure is attributed to the difficulty of the task or to bad luck, control of achievement on the task is out of the hands of the performing person.

These studies indicate, then, that educators seem to talk about boys and girls differently. Our present study cannot be extensively compared with experimental studies, however. Experimental studies employed prearranged categorical schemes and presented subjects with hypothetical situations of success and failure, whereas we evoke far-ranging narratives about actual educational situations. We noted

TABLE 9
Special Education Placement and Teachers' Referral Reasons

Rank order	LDG	TRR	TR	NAR
1	Behavior	Behavior	Ability	Behavior
2	Ability	Psy. state	Psy. state	Ability
3	Psy. state	Ability	Cog. focus	Psy. state
4	Task disposition	Task disposition	External	Misc. int.
5	External	External	Task disposition	External
6	Trait	Trait	Psy. state	Trait
7	Phys. state	Phys. state	Trait	Int./ext.
8	Int./ext.	Cog. focus	Behavior	Phys. state
9	Cog. focus	Misc. int.	Effort	Task disposition
10	Misc. int.	Int./ext.	Misc. int.	Effort
11	Effort	Effort	Int./ext.	Cog. focus
12	Intrins. motivation	Intrins. motivation	Intrins. motivation	Intrins. motivation

NOTE: LDG, learning disability group; TRR, tested, returned to classroom with remedial help; TR, tested, returned to classroom; NAR, no assessment recommended.

TABLE 10
Percentage of Negative and Positive Attributions for Boys and Girls

Category	Negative		Positive	
	Boys	Girls	Boys	Girls
Ability	16.6%	31.7%	26.4%	38.0%
Effort	3.1	1.3	4.5	7.9
Cognitive focus	6.1	9.6	3.0	3.7
Physical state	5.0	7.1	1.1	3.7
Psychological state	15.1	11.7	7.4	5.0
Trait	5.7	6.7	12.8	7.9
Behavior	20.2	10.4	8.9	7.9
Intrinsic motivation	.5	0.0	4.9	5.8
Miscellaneous internal	5.3	2.9	2.1	2.1
Task disposition	6.7	7.5	3.2	1.7
External	11.6	8.8	21.5	10.7
Internal/external	4.1	2.5	4.3	5.8
TOTAL	100.0%	100.2%	100.1%	100.2%

marked differences in the ways teachers talked about reasons for boys' and girls' success and failure: they made more attributions about boys than about girls; they tended to cast boys in negative terms, and girls in positive terms; they saw the causes of girls' failure in terms of their ability, or rather their inability, i.e., their inability to do math, their inability to read. By contrast, the teachers talked about the causes of boys' failure in terms of their behavior, i.e., unruly classroom conduct. They also cited boys' negative psychological states, i.e., being in depressed moods or being frustrated, as a main reason for their academic difficulty (Table 10).

The findings concerning ability as the primary cause of girls' school failure agree with findings from experimental studies. Our finding— that teachers account for boys' school difficulties in terms of their unruly behavior—does not, however, concur with previous studies. These variances may be due to the methodological differences between an experimental study and this more naturalistic one. We may obtain more ecologically valid interpretations when teachers are describing their actual students in actual situations in their own terms, instead of reacting to hypothetical students in contrived situations in experimenters' terms.

ACROSS-CONTEXT AND WITHIN-CONTEXT COMPARISONS

Because we followed students' referral cases from the classroom to the final placement meetings, we were able to make comparisons among the accounts about students' success and failure made by teachers, parents, and psychologists within the final placement meeting, and also of teachers' accounts within the decision-making meeting and during interview sessions about their classrooms. These comparisons have allowed us to consider differences in educators' opinions with respect to both success and failure across situations and across people. This information has been helpful in determining the relationship between accounts about behavior, surface behavior, and presumed underlying behavior patterns.

Teachers refer students for a wide variety of reasons. Are variations on commonalities apparent beneath the diversity in the accounts by a single person across contexts? Teachers must provide reasons for referring students at a number of points in the referral system: on official referral forms, to school psychologists, and in committee meetings, to name but three. Teachers discussed students' academic difficulties in similar ways in the context of the interview and in the

context of the committee meeting, specifically, in terms of internal factors. Only a small percentage of the reasons given were external to the student. That is, no teacher indicated that a child was referred because the present home or school environment was the problem. Students' ability, behavior, and psychological states were the most frequently cited reasons in both contexts. In interviews, however, teachers did provide expansions of their reasons for referral. For example, Shane was officially referred for low academic performance, not applying himself to daily class work, a history of behavioral problems and truancy in a previous district. The interview provided more information about his case. The teacher said that Shane's home background greatly influenced his classroom performance. She indicated that a recent shift in the structure of the family and a resultant lack of time spent with him also had an effect on Shane's performance. He appeared to be quiet and cooperative in class, and so the teacher was shocked when he cut school. When the teacher suggested to the parents that she felt Shane needed extra help, the mother indicated that there had been some discussion about this, but she resented it. The teacher thought that much of the delay in getting Shane tested and placed was due to the parents' lack of concern.

The teacher expressed particular concern because of Shane's interest in drawing gruesome pictures and writing gruesome stories. The parents indicated, however, that he had always been intrigued with war movies and science fiction, and saw it as a stage he would probably outgrow. The teacher said that she wanted the psychologist to seek out the causes of this behavior and to "let her know where to go from here" (transcript 11.333).

The teacher covered the same topics in both the interview and the placement meeting. In the interview, she indicated that Shane was too dependent upon her: "I just started really working with him a lot more and trying to just get his head going in another way. And anything positive he would write, one sentence, five words or something, I'd say: 'Gosh, that's really a nice sentence.' Well, he started getting more positive things. It still had to do with war, but it seemed to be more positive" (11.323). In the placement meeting the teacher said that "Doing independent work is hard for him" (8). In the interview, she indicated that Shane's motivation was influenced by his enjoyment of work: "At the end of the day he turns his contract in and he'd finished everything. And I said, '[Shane], I'm just so excited, you know what's happening?' He said: 'I just made myself a schedule. I just thought that if I looked at that clock . . . and say at nine-thirty I'm

going to have my schedule done, then I really work for that, you know, I get as much done as I can. Then I thought, I got to go on, I got to win" (11.351). In the placement meeting, the teacher indicated that "he really seems to enjoy handwriting and *wants* to learn it. . . . He really tries hard at it and seems to want to learn it better" (30.7–34).

Although the emphasis on internal factors was fairly consistent in the interview and placement meetings, teachers were more positive in the placement meeting than in the interview. This difference may be accounted for by the demands of the placement meeting to show a discrepancy between potential and performance, or a wish to portray the child in positive terms in front of the parent. It may also reflect the reduction of constraints in the interview, where teachers said they were more relaxed than in committee meetings. Hence, we might conclude that accounts are dependent upon the context in which they are elicited.

Although a teacher's judgment about the causes of a student's academic difficulty is important to the final referral decision, there are other influential sources of information, among them: the school psychologist's tests and formulated test results, special educators' observations of children in classrooms, and parents' observations about their children out of school. This plethora of information comes together in the final placement meeting where the disposition of the case is settled.

A detailed examination of one final placement (E&P) meeting allows for a comparison of the accounts of students' school difficulties provided by different committee members. In this meeting, discussed in Chapter 7, the student, Shane, was placed in an LDG program. In the information presentation phase of that meeting, the student's mother, his teacher, the school psychologist, and the school nurse discuss the student characterized as having "troubles" and "problems" in applying himself to his daily work and in switching channels, and as suffering from fears and anxieties (3, 5). The judgment of the classroom teacher is that his particular "problems" are with fine-motor things and with independent work (6, 8). Thus, the issue before the committee is the child and his problems, characterized by both the classroom teacher and the psychologist as being internal to the student—his private and personal possession. The purpose of the meeting, indeed of the entire referral enterprise, is to solve the student's problem by altering or modifying his internal state.

The focus of attention for the entire committee is the student's problem. The information introduced by the mother and the teacher dif-

fers from that offered by the psychologist and the nurse. With respect to the student's motivation: the teacher says he enjoys both math and, especially, handwriting, which he seems to want to learn better (28, 30, 34). She also discusses some of the circumstances surrounding the student's problems and introduces a number of contingencies that influence his performance:

1. His performance varies as a function of preparation: "If he studies his spelling and concentrates on it he can do pretty well" (22).

2. His performance varies according to the kinds of materials and tasks. (a) "It's hard for him to copy down [math] problems . . . if he's given a sheet where he can fill in answers and work them out he does much better" (28). (b) He does better on group tasks, "but doing independent type work is hard for him" (8). (c) If the tasks at hand are a means to some other end desired by the student, then his performance improves: "if there's something else he wants to do and knows he needs to do and knows he needs to get through that before he can get on to something else, he'll work a little more diligently at it" (45).

3. The teacher's remediations are contingent upon the kind of work and the importance of the task. When the nurse asked her how she dealt with the "writing problems," the teacher indicated that her solutions varied. If the task was important, then she had him redo work. If it was a "rush job," then she had him clean it up a bit (30).

The classroom teacher provided more details about the circumstances surrounding the problems. When the special education teacher inquired about the student's reading level (15), the classroom teacher's response, "about middle third grade" (16), was presumably based on the results of a reading test that accompanies the reading series used by the district. She then supplied some details about his performance: "He's a good reader, but as far as comprehending it and being able to recall sequences of a story and things like that" (16). She identified two components of the reading task, and provided some sense of the particulars of the reading process upon which her assessment was based.

With reference to the student's work in spelling, she not only commented on his level of performance, but also provided information about the aspects of the spelling process that caused him difficulty (21–22). The special education teacher asked about the student's handwriting (31–34) with a "choice question" that would allow a "yes" or a "no" response. The teacher exceeded the minimal demands of the question by indicating frequency of use and by comparing this student to other students who "slip back into printing." And, once

again, she mentioned his motivation: "he tries to learn" and performs academic tasks.

The classroom teacher also made observations about the manner in which the student performed his work, that is, the process, and not just the product of his work: "he's got his multiplication tables down pretty well, but not as quick as I'd like to see him have them" (28). The speed of processing is discussed here along with the students' knowledge of the academic task. The comments, "doing independent type work is hard for him . . . sticking to a task . . . and getting it done without being distracted" (8–12) point to his perseverance and concentration, along with the kind of academic task he has been assigned.

The psychologist had reported that "he seems to have good peer relationships" (3). The special education teacher returned to this topic in her questioning, and the teacher provided more detail about his relations with classmates (14). Later in the meeting she provided more particulars, explaining that "he's been elected a class officer, and gets along well with girls" (87, 89).

In sum, the teacher, like the psychologist, characterized the issue before the committee as "the student's problem." However, the teacher's characterization, unlike the psychologist's, had a contingent quality.

If it can be said that the classroom teacher is expanding the range of information available to the committee spatially by providing situational or local contextual information, then the mother's report adds a temporal dimension by providing historical and biographical contextual information. She continually contrasts her son as he was at an earlier age with the student he is now, each time emphasizing improvements and changes for the better. Thus, it seems that she is working to redeem her child. Even though she seems to acknowledge the official committee position that there is a problem, she attempts to legitimate her child by emphasizing improvements and by providing an alternative explanation of the source of the problem. For her, the locus of difficulty is not within him ("it's not physical," "it's not functional"), but is to be found in his past experience and the situations he has been in.

The reports provided by the psychologist, the classroom teacher, the mother, and the nurse can thus be placed on a continuum from the contingent to the non-contingent. The mother's report is at the contingent end because she provides particulars about the biography and history of her son and references situational circumstances. The classroom teacher's report lies next to the mother's report on the con-

tinuum because she tempers her report with statements about local circumstances, but does not provide historical particulars. The nurse's and the psychologist's report are at the non-contingent end of the continuum, because their statements are devoid of all situational and historical contextual features.

The psychologist made categorical statements about the student's abilities, placing the locus of the problem within the student himself. The result is a view of a child who has a general, i.e., "context-free," disability. In responding to the questions from other members of the committee, the classroom teacher tempered her report with contingent factors of a situational sort: his state of motivation, kinds of classroom tasks, and types of materials. The result is a "context-bound" view of a child, one who has specific problems in certain academic situations, but who operates more than adequately in other situations.

SUMMARY

Subjective interpretation is a mediating force in social and educational life. The educators in our study are not perceiving students' behavior directly. Their perceptions are mediated by categories that are provided by the culture and experience. This finding is consistent with cognitive studies in psychology, sociology, and anthropology. Specific conclusions that emerge from this phase of the study concern (1) the congruence in teachers' accounts about students' performance, (2) the use of accounts in institutional contexts, and (3) the ecological validity of educators' accounts.

We analyzed accounts concerning academic performance generated by many teachers, in different situations and concerning different special education outcomes. The teachers in our study seem to view their students' behavior in terms of pre-formed categories or preconceptions, which in turn affect their perceptions of students' success and failure. Given that individual teachers differ in the way they construct specific dimensions of disability, the variations fade away when the structure of their accounts about disability is considered. Despite the wide diversity in the circumstances in classroom configurations, individual students' biographies, teaching styles, grade level, and the rest, the categories that teachers use to account for students' success and failure are very consistent. This suggests that educators share a similar theory regarding what constitutes academic success and failure.

One of the most consistent features of these accounts concerns the locus of the student's problem, which becomes the basis of referral.

The problems are characterized by classroom teachers, psychologists, and nurses as being internal to the student. They are treated as personal and private possessions, a prime example of the use of dispositional properties in the search for the explanation of other people's behaviors. This "personological" or individualized defect (Lopes, 1979) conception places the source of the problem "squarely on the back, or rather in the head of the child" (Coles, 1978: 333). Personological accounts offer categorical assessments of student performance and result in a context-free view of student disability.

Although educators' conceptions of students' success and failure are mediated by observed behavior, they are not a direct reflection of it. Educators view students' behavior in terms of dispositional properties, and relate particular behavior to the production of particular accounts.

Our study has uncovered some of the complex interactional and contextual features involved in the perception, description, and characterization of students. This complexity has convinced us that theories positing consistency to roles (those of referral and non-referral students) and labels (referral student, EH student, LDG student) need revision. More specifically, these roles and labels need to be understood as products of educators' and students' interactional work. For example, many personality theories maintain that there is a stable set of invariant conditions beneath trait-terms. The warrant for such claims includes the personality research that shows considerable consensus among observers assigning personality characteristics to the same actor. Findings about the relationship between accounts and behavior run counter to stable trait-theories. We find that behavior is not very consistent across situations; descriptions about such behavior are very consistent across situations.

The gap between educators' accounts and observed behavior raises the related issue: what are the consequences of applying labels like "educationally handicapped" or "learning disabled" for students' careers in schools. Garfinkel (1967) showed that the procedures used by a jury to reach decisions were only tangentially related to the accounting procedures used to report the verdict after it had been decided. Cicourel (1968, 1978) has shown the ways in which accounts recorded in official files serve as post-hoc justifications of previously taken bureaucratic actions. In a similar manner, we have found that educators' judgments seem to reside more in the semantic categories of the language used to describe students' behavior, less in the presumed stable patterns of behavior beneath such trait-terms as "learning disabled"

or "educationally handicapped." Students' behavior does not seem to lead to educators' judgments, which then become the basis of an educational decision. Rather, the educational status of the educators' account seems to be a post-hoc institutional rationalization of actions taken previously.

The attributions used by educators in our study are different from those reported in experimental studies. Cooper and Burger (1980) reported that teachers said students succeed most often because of their effort. We found, however, that the most salient factor in educators' judgments was students' ability. We also found variations across persons in the use of external and internal attributions. The psychologist and the special education teacher placed the locus of the students' problem within the student; the mother and the teacher brought in more situational factors. These cross-person differences seem to be a function of the knowledge available to each committee member, which in turn is a function of position in the institutional order of the school.

We think that these differences may also have a methodological basis. In experimental studies of attributions, subjects are typically asked to evaluate hypothetical situations using categories provided by the experimenter. In our study, educators evaluated actual situations, using their own categories. This difference in strategy seems to get us closer to the categories that educators actually use to make educational judgments. We have an advantage over many of the previous investigations of attributions: a videotape record of naturally occurring situations that augments the usual sets of accounts about hypothetical situations, thus enabling us to examine the relationship between educators' accounts and students' behavior. By comparing behavioral records with accounts of naturally occurring events, we have been able to describe some of the interactional activity that contributes to the construction of teachers' accounts and the relations between behavioral patterns and descriptions of those patterns.

CONCLUSIONS

In the most general terms, we have been investigating the process of classification, how people put items into categories or classes. In more concrete terms, we have examined how educators classify students and place them into such educational categories as "learning disabled" or "educationally handicapped." As the concluding statement to our study, we will draw the implications and consequences of the institutional practice of educational classification in three domains: (1) the conception of students in schools, especially handicapped students, (2) theories of decision making, and (3) theories of social stratification.

INSTITUTIONAL PRACTICE AND HANDICAPPED STUDENTS

We have described a number of legal, fiscal, and practical circumstances that confront educators as they carry out their daily work. Examined individually, the activities that educators take in response to these circumstances seem innocuous and of no particular importance. When taken together, however, these mundane activities operate structurally to constrain the educational classification process.

The routine bureaucratic practices of prescreening teachers' referrals, changing administrative reporting procedures, and discouraging referrals from certain educational programs at certain times of the year, influence students lives in schools. They structure students' educational careers by constraining access to particular educational programs. The structural importance of practical circumstances leads to the most general conclusion that we have reached from this study:

student identities are constructed by the institutional practices of the school. This means that designations like "learning disabled student," "mentally gifted minor," or "average student" are characteristics not exclusively of children's conduct (e.g., their talent) or those characteristics associated with social class background (e.g., the possession and use of "cultural capital"). Nor are they a direct manifestation of educators' beliefs or expectations. Instead, they are a consequence of institutional practice.

The institutional practices that construct students' identities are a particular form of "social practice" (Garfinkel, 1967; Mehan and Wood, 1975; Mehan, 1984) or "cultural practice" (LCHC, 1983). To "practice" social life is, literally, to work at its construction and maintenance. Practice constitutes social life; it is not an incomplete rendition of a more ideal form. Practice encompasses people's application of ideals and norms as well as practical action in concrete situations of choice. When we observed educators, we found them engaged in this construction work. We have found them "doing testing," "doing counseling," "doing decision making." The notion of work, signaled by the purposive use of the unwieldy gerund "doing," stresses the constructive and fluid aspects of institutional practice. Educators' work is repetitive and routine, but its mundane character should not overshadow the drama of its importance, for students' careers are assembled from such practice.

This institutional practice view of educational handicaps contrasts with the view that there is a real world of troubled children "out there," waiting to be identified, assessed, and treated. From a realist point of view, handicaps reside in students or in their conduct. This view pervades the medical model that forms the basis of definitions of disability in federal guidelines and informs practice in local schools. According to PL 94-142, children's handicaps may encompass innumerable problems and defects: mental, auditory, orthopedic, speech, visual, emotional, general health, specific learning disabilities—all of which "by reason thereof require special education and related services" (PL 94-142, sec. 4[a][1]). That is, vision, hearing, and motor activities are physical states of children that require medical attention. The medical metaphor has been extended from the physical to the mental domain within education. As a consequence, intelligence, aptitude, or mental ability have become medicalized and subject to treatment. It is this medical metaphor that leads to the view that students have a "problem." This problem is a disability, perceived as residing within students, as their private and personal possession.

This personological view of disability has had consequences for the measurement of students' abilities and disabilities. Since disabilities reside *in* children, assessment and remediation is focused *on* children, which is the rationale for the use of psychological testing to find and/or confirm the presence of a disability within the child.

Students' conduct, instruments of assessment, and measured outcomes are treated as separate and independent entities in the medical model. Once an assessment is assembled and a student is categorized, this categorization is detached from the manner in which it was produced, thereby ignoring the educational and societal context—including the role of teachers, testers, and other students in assessing the nature of the disability. Once detached, the classification seems to take on a life of its own. By contrast, the institutional practice view of disability does not separate the child's problems from the process of their discovery or the procedures for their assessment and treatment. When the reflexive links between educational categories and the modes of their production are made explicit, this personological sense of identification and assessment is countered. The problem of disability is redefined in interactional terms.

The institutional practice view of disability has consequences for the labeling theory of deviance. The main difference between normals and deviants, according to the theory, is that deviants have been apprehended by formal institutions (e.g., courts and hospitals), while so-called normals have not been caught, even though normals and deviants have committed similar acts in many cases. Thus, from the perspective of labeling theory, deviance is to be found not in the acts or characteristics of people, but rather in societal reactions to people's behavior.

We concur with labeling theorists insofar as they say that the source of deviance is not only in the acts of people. Our research shows that disability is not inherent in students' acts. Rather, disability, educationally speaking, is constituted by educational practices enacted as a routine part of organizational life. Students present behavior that becomes defined as educationally anomalous by an educational scheme of interpretation, thereby attaching the designation "disability" to students' behavior. That is to say, disability is grounded in students' behavior, but requires the categories that the educational system brings to the interaction, including expectations for academic performance, norms for appropriate classroom conduct, views of family and community life, and perceptions of parent-child relations.

When we indicate the importance of educators' categories for deter-

mining educational disabilities, we are not adopting a simplistic version of labeling or expectancy theory as does Rist (1977). The categories that educators bring to the interaction are not entirely independent of students' behavior, as some versions of expectancy and labeling theory would lead us to believe. Rather, what educators bring to the interaction with students in classrooms and tests interacts with what students do with educators in such situations. Educational classifications emerge from interactional encounters between students and educators and become reinforced and refined by the institutional practices that are used to identify and assess students.

Our research leads us to agree with labeling theorists about the interactional and institutional source of deviance, and what we have learned about the social organization of educational handicaps leads us to extend the societal reaction aspect of labeling theory. Educational handicaps do not seem to be merely the society's or the institution's reaction to the behavior of students; they seem, instead, to be generated by the society and the educational institution itself. The institutional generation of educational handicaps has many contributors, including the writing and passage of law at the federal level and the interpretation and implementation at the local level. Local practices initiated by local schools in response to fiscal, legal, and practical considerations are particularly influential. They stand in a prospective and retrospective relationship to students' behavior, not just the retrospective relationship proposed by labeling theory. The relationship between students' behavior and institutional practices is prospective in that federal policy and local agencies establish categories of disabilities; it is retrospective in that search procedures are then devised to find students for the programs (if they are not filled), or to place students elsewhere (if the programs have reached their limits).

People with learning disabilities, educational handicaps, and mild retardation are most often identified in school. However, once such children leave school, many will never be identified in these ways again. To support this claim, Edgerton (1979) reports a 1956 study of more than 1,000 individuals in Birmingham, England, who as children had an IQ below 50; 14 percent of the women and 26 percent of the men were employed, and only 14 percent were living in institutions as adults. Edgerton (1979: 72) also coined the term the "six-hour retarded child" to refer to children who have been identified and classified as handicapped in school but who adapt perfectly well to life outside of school. If children are handicapped only in school, then it is possible to say that the school itself creates or generates handicaps.

The institutional practice perspective emphasizes the relation that cognitive processes have to social contexts. There have been many studies that show the variability in people's displays of competence across contexts (see LCHC, 1982a, 1983 for reviews). It seems that learning ability and disability also have this feature of context specificity. Feldman's (1979) analysis of child prodigies exemplifies the context-specific view of competence. Prodigies are children who perform in a given field at an adult level of professionalism before their tenth birthday. Feldman gave a sample of these children a wide range of tests of formal reasoning, including Piaget's five chemicals task and Flavell's role taking and map drawing tests, and found that precocity in one domain of development does not seem to generalize to other domains of development. All prodigies fell within the normal range on these tests, but none of their scores were spectacular or remarkable in comparison with their extraordinary achievements in chess or music.

Feldman's study also illustrates the reciprocal relations that exist between individuals, their talents, and their contexts. He counters the view that children's prodigious achievements are a function of genius, i.e., natural gifts, with the view that prodigious achievements are a remarkable coincidence between the human organism with a powerful set of predispositions, a well-specified intellectual domain, and a dynamic and dedicated teacher. The occurrence of a remarkable achievement within a field by a young child depends on the experience and transmission of a highly evolved and well-specified domain of knowledge. It also depends on a student's education by a practiced teacher in such a manner that the young child is able to interact optimally with that evolved field of knowledge:

Our conceptualization of early prodigious achievement as coincidence points to the need to understand the reciprocal relations among intrinsic human talents, culturally evolved qualities of a field, craft, or discipline, and traditions pertaining to the formal transmission of knowledge. To ignore one set of these factors is like watching a player piano; despite what it looks like, the piano does not play itself. Reciprocally, every great performer at the piano is playing music, which has a history of its own, and that performer is playing music on a piano which has a history of its own, and that performer is playing music on an instrument which has a history, too. To understand achievement, one must understand the joint histories of all the participants, and this is especially true where really remarkable achievement occurs. [Feldman, 1979: 351]

This context-specific view of cognitive processing counters the notion that ability or disability is a general or static trait. Arguing against the "states and traits" conception that pervades the medical model in-

herent in special education laws and policies, Mercer (1975: 99) recommends a "social system" perspective that "attempts to see the definition of the individual's behavior as a function of the values of the social system within which he is being evaluated. . . . Deviation is not seen as a characteristic of the individual or as a meaning inherent in his behavior, but as a socially derived label which may be attached to his behavior by some social systems and not others." What she calls a social systems perspective is similar to what we have been calling an institutional practices perspective. Both recognize the context-specific basis of performance and the institution's contribution to evaluations. Students' performances vary from one type of context to another. This variation is a natural and normal part of growing up, as much for the gifted as for the handicapped student.

The situational variability in students' performances has implications for the way the measurement of those performances is reported. Simply stated, any generalization about competence from any one type of performance will not necessarily be accurate. This holds true for general statements about a student's competence based on information from either a formal situation (e.g., educational testing) or an informal situation (e.g., peer encounters of the type Labov has exploited so ingeniously). Both formal and informal situations are specific contexts. Students' performances are specific to those contexts. Therefore, it would be inaccurate to conclude that a student who performs poorly on a test of verbal ability in a one-to-one situation is nonverbal. Likewise, it would be inaccurate to conclude that a student who provides rich descriptions and engages in extended discourse with friends on the street corner is verbal. General conclusions in either case would be inaccurate, for they make attributions to a uniform ability, thereby confusing performance in specific types of situations with a general competence.

General statements about students' competence (e.g., "she is smart," "he has an educational handicap") have been stripped of what ethnomethodologists have called "indexical particulars" (Garfinkel and Sacks, 1970). Reference to the measurement instrument, the physical surroundings of the assessment, the mood, the physical and mental state of the participants, and a host of other features too numerous to mention (and perhaps not even to be enumerated) have been deleted when such general statements are made. This stripping of indexical particulars seems to be a fairly common practice in everyday, medical, and scientific discourse. In the context of psychological and educational assessment, the use of indexical expressions contrib-

utes to the notion that ability and disability are traits and states possessed by an individual, rather than being a part of the social system of the school and the society of which it is a part.

Disability, we conclude, exists neither in the head of educators nor in the behavior of students. It is, instead, a function of the interaction between educators' categories, institutional machinery, and students' conduct. That is, designations like "disability" and "handicap" do not exist apart from the institutional practices and cultural-meaning systems that generate and nurture them.

When we concede that educational handicaps are neither internal states nor diseases, but derive their meaning from their participation in an institutional variety of a cultural-meaning system, then they are more like property rights than like a medical affliction. Students have difficulties in school, are withdrawn, or "act out." Their problems are real, but it is important to understand how they become real. They do so by a complex set of legal and educational practices, school rules and policies. Learning disabilities, too, are objects, but they gain objectivity by becoming culturally constituted by the rules, laws, and daily educational practices of the school. Without the institutional practices serving and guiding special education, we would not have learning disabilities or educational handicaps.

INSTITUTIONAL PRACTICE AND EDUCATIONAL DECISION MAKING

Some of the institutional practices that contribute to the assembly of educational placement decisions have already been described. Now we can consider the status of those practices in light of theories about decision making.

Ratification of Actions Taken Earlier

This investigation of the organizational practices of decision making shows that placement outcomes were more ratifications of actions that had taken place at previous stages of the decision-making process than decisions reached in formal meetings. This is not to say that the E&P Committee is simply applying a rubber stamp to decisions made surreptitiously (Becker, 1963) or performing a public ritual to parade decisions made behind the scenes (Goffman, 1961). The distinction between conspiracy and ratification is similar to the organizational differences between the problems posed to subjects in experiments and those organized by participants in naturally occurring situations.

In an experimental situation, a finite number of variables is isolated

and presented to the subject. The subject's job is to sort among this small number of variables. Thus, the problem is under the control of a single person or can be managed by that person. The information available to the committee is not the same, inasmuch as the number of variables to be considered is much larger than that presented to the subjects of an experiment. The scope and complexity of the variables is also great, and is, in fact, part of the committee's project to identify the relevant variables and then sort them out. The problem-solving situation for the placement committee is like other naturally occurring situations, and unlike experimental situations, by virtue of the presence of others who serve as social resources (Lave, 1979; Cole and Traupmann, 1980; Levin and Kareev, 1980). The committee members are knowledgeable, not only in the general sense of being highly trained and experienced educators; each committee member has also a repository of information about the particular student being discussed. Each person comes to the meeting as an informed citizen (Schutz, 1964: 120–34) with regard to the student, and each has a memory of similar, past committee meetings. As a consequence of this social distribution of knowledge, the information upon which decisions are being reached is not in any one individual person's memory; it is in the collective memory of the group.

Therefore, it is more productive to think of committee meetings as a culmination, a formalization, of a lengthy process that originates in the classroom. The construction of an educationally handicapped student's career starts when the teacher makes the initial referral. Often, the teacher has only a general notion that a student is in trouble, or needs help. This initial, rather general attribution, which establishes the presumption of a handicap, becomes refined as more and more institutional machinery (e.g., tests, committee meetings, home visits) is applied to the case until, finally, by the time of the placement meeting, only a parent's refusal to sign the pertinent documents would be likely to change the assumed placement. The fact that all but one of the cases brought before E&P committees resulted in special education placement is further evidence that early actions were being ratified at this stage in the process.

This study also shows that there is no need to disparage everyday decision making by comparing it with rational models, formal reasoning, or scientific thinking. It seems unnecessary to posit a gap between some ideal model and actual practice. Instead, it seems more appropriate to call into question the efficacy of scientific reasoning as a model of everyday reasoning. There are good organizational reasons

why institutional decision making occurs as it does. The decision-making circumstances assumed to exist by the rational model are not available to problem solvers in formal organizations like schools, hospitals, and businesses. Decision makers simply do not have access to the unlimited resources presupposed by rational decision-making models.

Furthermore, the rational model assumes that all the factors being considered in the decision-making calculus have an equal weight. In the complexity of institutional settings, however, not all factors necessarily do have an equal weight. A certain fastidiousness is required when considering all the alternatives, which can blind the decision-maker to an appreciation of the most important factors that need to be taken into account. As Watkins (1970: 206) says, "A well known obstacle to computerizing chess is the lack of any known way to program a computer to concentrate on *interesting* developments: like the ideal decision maker of normative theory, the computer surveys the entire board and takes every possibility into account." In the case of our school district, fiscal, legal, and practical circumstances constrain the process by which decisions are reached. For example, when considering the placement of a student into a special education program, the students' age, gender, IQ scores, and space available in a program may all be factors to consider. But, as we have seen, a single factor, such as the space available in the program, may outweigh all others in its consequences for decision makers. That is, in dealing with comparable problems, experience may tell decision makers that it is best to be highly selective, and to pay attention to a few salient alternatives that they know well in advance, instead of painstakingly computing the combination of all possibilities. These organizational constraints and this prior knowledge lead educational decision makers to reduce the range of alternatives, make educational placements by available category, and ratify actions taken earlier.

Cognitive psychologists have described a number of procedures that individual problem solvers use to cope with information overload, limitations of short-term memory, and other information-processing limitations—among others, the salience, availability, representativeness, and anchoring heuristics. Some of the institutional practices that groups of people working in social organizations have devised to cope with the practical, legal, and fiscal constraints on decision making have also been described here. These practices are part and parcel of an institutionally arranged system for making frequently recurring decisions (cf. Quinn, 1976).

Problem-solving heuristics and institutional practices are similar processes, although their locus of operation seems different: the former, thought of as operating "between the ears" of individuals; the latter, "between the people" in an organization. Thus, we have similar cognitive processes recapitulated at different levels of social structure. The psychological and social operations may be similar, but one does not reduce to the other. Decision making at the institutional level will not be described simply by adding a few more factors to a psychological model (as Simon, 1976: 253–67 has suggested). A complete cognitive theory will need to include a description of both psychological and social cognitive operations, and a description of their articulation together in order to explain how both sets of processes are made manifest in interaction between people.

A number of important psychological theories, including those of Piaget, Witkin and Berry, and Simon have been characterized as incorporating a "central processing" feature (LCHC, 1982). Central processing in this context implies a universal set of cognitive operations, internal to the individual, that operate in a centralized fashion to control how the world is interpreted and acted upon. Central processing is also a feature of the rational model of decision making in both its comprehensive and its bounded forms. In the psychological context it implies the operation of a unitary actor. Individual problem solvers or large-scale organizations make choices by considering payoff functions, generating possible alternatives, assessing consequences of probabilities, and the rest; they do so in centralized, controlled ways on particular occasions.

The decision making we have observed in this institutional context does not have the features associated with central processing. It seems, instead, to be socially distributed, and in two senses of the term: across participants and through time. Decision making is distributed across participants in that information about a given case is not under the control of any one committee member, and it is distributed through time, in that bits and pieces of the final decision are made at various stages in the referral process (see Figure 2). The process starts in the classroom; information is added at appraisal, assessment, and reappraisal phases, and meetings with parents provide still more information to some, but not all, of the committee members.

Thus, information is gathered at different points in time and is scattered across various committee members. The first time that the committee hears all the particulars of a case is in the E&P meeting, when the complete picture of the student emerges from the particulars pre-

viously distributed. The decision-making situation in which the variables or information are not under the control of any one person is an example of what Schutz (1964: 120–34) has called the "social distribution of knowledge," and what cognitive psychologists have called "distributed processing." In socially distributed processing, the information upon which decisions are made is in the collective memory of the group, not in any one individual's memory.

This distinction between central and socially distributed processing enables the logical status of the committee's actions to be reconsidered. From the viewpoint of a group of people deciding an educational placement based on a student's needs, the procedure seems illogical or irrational, because the committee is not considering the full range of possible placements, not considering one variable at a time, and/or not reviewing the complete means-ends matrix. This interpretation dissolves when a socially distributed view of decision making is taken into account. The actions of the committee look more rational when one realizes that many factors in addition to the students' needs were entered into the equation. While the combination of all possible placement categories was not considered in any one committee meeting, the full range can be seen distributed across referral, appraisal, and evaluation phases of the referral process. Watkins (1970: 206) captures this aspect of everyday decision-making practices exactly:

An ideal decision scheme is pictured as being present to the agent's mind in its entirety, a completed whole in which the several components simultaneously play their dual role. An actual decision scheme is usually built up bit by bit, so that the arrival of an isolated bit of situational information may have a disproportionate influence. And even when all the evidence is in, the practical significance of different parts of it may wax and wane as the decision maker attends now to this factor, now to that.

The rational model of decision making implies that events have causes, and that bureaucracies perform large actions for large reasons. For some purposes, organizational behavior can be usefully summarized as action chosen by a rational decision maker, centrally controlled, completely informed, and value maximizing. However, the present work suggests, as has prior work (Allison, 1971; March and Olsen, 1976) that such a view must be balanced by the appreciation that large organizations are highly differentiated decision-making structures. By this organizational process view, large acts emerge from many smaller actions, socially distributed across many levels of an organization. These small acts are the consequences of standard operat-

ing procedures for dealing with standard situations. Such routines allow large numbers of ordinary people to deal with numerous instances day after day. In this district we see such routines as directives written to enact the provisions of special education federal law—about MR students and off-campus placements, the organization of the sequence of decision making, and the temporal order in the conduct of business in a given E&P meeting. Such organizational routines and institutional practices structure decision-making situations and narrow the possibilities in terms of which decision makers can make decisions about students' placement.

Furthermore, the project before the final decision-making committee is a preeminently practical one. The decision-making task is a part of the educators' job, a routine event in the course of their daily, institutional lives. This practical concern makes the committee sensitive to the nature of particular cases and particular outcomes. The committee is faced with a specific problem that demands an immediate and concrete solution. Its members are concerned with this student, this placement, at this time. They are not concerned with generating the range of all possible actions that exist in the abstract. They have a pragmatic, not a theoretic, motive for their actions.

In that respect, the actions of committee members are similar to the actions of grocery shoppers. Lave (1979) reports that grocery shoppers do not often make complex mathematical calculations overtly. Numerical calculations are submerged in the practical project of getting groceries. In a similar manner, the committee's "decision making" is submerged in the practical activities confronting the committee members during the course of their daily, institutional lives. In both cases, what appears to be the manifest project from the point of view of rational action (i.e., grocery shoppers making calculations, educators making decisions) turns out to be a component part of more inclusive practical projects. The manifest cognitive task is embedded in an ongoing project of practical action.

We are proposing a shift in perspective—a shift in metaphor, really—for viewing organizational behavior. When organizational behavior is examined from the perspective of the rational model, acts and choices are seen, and reasons and motives are searched for; from the perspective of the institutional practice, one sees end results and looks for the routine practices that constitute them. As a consequence of this shift, organizational behavior can be understood less as deliberate choice and more as end results or consequences of organizations functioning according to standard operating procedures. For this case

study, such a shift in metaphor means that the placement of a student is a matter of organizational procedure rather than of organizational choice. The placement of a student in a special education program is not so much a decision made as it is an enactment of routines.

EDUCATIONAL CAREERS AND
SOCIAL STRATIFICATION

As we indicated in the Introduction, contemporary studies of social stratification have most often been concerned with the relationship between (a) people's socioeconomic origins in the social structure, (b) schooling, and (c) the places where people end up in the social struc-. ture. We distinguished two main schools of thought concerning the role of schooling in the social mobility process. Researchers who see schools facilitating social mobility propose a positive relationship between schooling and status attainment. Those who say that schools serve to maintain the status quo also recognize a relationship between schools and status attainment, but say that schools are organized to depress mobility. Despite researchers' differences on the role of schooling in social mobility, there are striking similarities in the research approach of channel-of-mobility and reproduction theories. Both schools of thought have treated the crucial variables in the social stratification equation as static entities in the social order. Socioeconomic status, schooling, and status attainment are treated as objective facts, detached from lived experiences of everyday life. In short, contemporary studies of social stratification acknowledge a school- and status-attainment relationship, but none of them explicitly express the substantive manner in which so-called macrostructural forms are realized in interaction.

In our examination of the consequences of schooling for status-attainment, we have tried to do more than appeal to factors such as social class, or the background characteristics of students, or their school performance. In our attempt to make linkages between social stratification and social interaction, we have tried to determine how factors such as the characteristics of students and school performance actually operate in the arena of schooling.

In fact, trying to determine how the factors of social stratification are worked out in the actual day-to-day activities of students with educators was an essential part of our motivation for the career study approach that we adopted. We have examined the different ways in which students' educational careers are produced, including the ways in which decisions made at different points in students' lives have in-

fluenced the outcomes that would be measured by a study of status-attainment. Our strategy has not been to pose a research question about social mobility or social stratification and then search for correlations in census or survey data. Instead, we have studied the day-to-day practices of schooling—primarily activities in classrooms, the use of standardized tests, and the routines of teachers, committees, and administrators that place students in different programs or courses of study—and found them, especially the educational decision making, to be vital. These everyday practices, and the decision-making process that is embedded in organizational routine, create certain educational career paths. The placement of students on one or another of these paths generates interaction and structural conditions that open up or close off later educational and occupational opportunities.

Detailed studies of the workings of the social organization of schooling contribute to our general understanding of the status-attainment process in general, and to reproduction models of the process, in particular. Through an examination of the interactional and institutional practices of schooling, we find that schooling (broadly conceived to include classroom interaction, educators' decision making, and the interface between local practice and federal policy) makes a difference in the lives of students.

Insofar as it can be said that schooling reproduces the existing status and class arrangements in society, looking closely at the workings of the organization of schooling is important for showing how this stratification is done. Students are sorted and stratified in such a way that differential educational opportunities are made available to them, a fact that is consistent with reproduction models of a role of schooling. However, this stratifying is not always based on students' measured abilities or on their background characteristics. Although the importance of these attributes cannot be underestimated, we must realize that schools are also places where cultural capital matters (DiMaggio, 1982: 189; Erickson and Shultz, 1982) and that decisions are made on the basis of particularistic considerations and the press of bureaucratic constraints. The status that students attain emerges out of continuous interaction between the child's inherited or developed capacities, the early socialization that precedes schooling, and the child's ability to convert his or her cultural capital into skills or behavior expected by educators, and then meshes with the stratification practices of the school (Cicourel and Mehan, 1984). As a result, it seems prudent to make further inquiries into the mechanisms of statification in schools as well as in peer groups (Willis, 1977) and communities (Ogbu,

1978). This will enable us to move away from simple correlations be-
tween background variables, schooling, and attained status, toward
descriptions of the process of stratification.

Our findings also have something to contribute to the mediation-
of-mobility perspective on the role of schooling in society. Since
deTocqueville, observers of American society have identified individ-
ualism, hard work, and personal effort as dominant American values.
There is a strong affinity between the categories that the educators,
especially the teachers, used to describe students and the categories
that are considered important in American society. The teachers in
our study, for example, cited personal and individual characteristics
such as students' ability as the basis of students' success and failure.

This coincidence of educators' accounts and American values sug-
gests that there is a relationship between what goes on in schools and
American ideology. In the classroom, teachers are judging students
in terms of the values that are presumed to be a significant part of
American ideology regardless of what the bureaucracy does with stu-
dents after they have been referred from the classroom. It is an aspect
of the socialization process in schools that teachers are wittingly or
unwittingly participating in the cultural transmission of American
values—an important aspect of the channel-of-mobility perspective
on the role of schooling in American society.

The integration of macro structures and micro interactions is a rou-
tine bureaucratic practice within institutions such as schools. Bureau-
crats routinely integrate what researchers have segregated as the micro
and macro aspects of everyday life as a part of their daily work. It has
been a central part of our research project to document how this inte-
gration is achieved as a part of the everyday work of schooling.

Detailed studies of educational practice, for example in the assem-
bly of classroom lessons, educational testing results, and counseling
interactions, have been criticized for concentrating on the immediate
contexts of schooling while ignoring the wider social system of which
these events are a part (Heath, 1982; Giroux, 1982; Gilmore and Smith,
1982). In the extreme, so-called microethnographic studies of school-
ing have been accused of reducing social structures to entirely local
productions (Ogbu, 1981). The career-study approach that we adopted
for this research blunts this criticism by placing the interconnections
between some of the important sub-units of the school (e.g., the class-
room, psychological services, and administration) and the intercon-
nections between the local situation and more distant contexts (e.g.,
the federal level of government) at the center of focus.

Our study has shown how the official version of students is con-

structed, under the influence of the bureaucratic organization of the school, from information that is diverse and often competing Some of this information is gathered from face-to-face encounters between sudents and educators, as in the class or testing room. Other information is obtained from documents in the case file, which are documentary records of previous face-to-face encounters. Still other information that contributes to the official version of the child emerges from committee meetings in which only documentary information about the student is available.

The construction of the official version of special and regular students is also influenced by the society of which the school is a part. Federal policy about special education interacts with local administrative policy concerning curriculum, textbook adoptions, and teaching and discipline methods and influences actions within the school. The link between federal legislation, regulations, and local practice is often direct. Administrative regulations help to carry out the intent of the law, which is itself abstract; the enabling policy, however, is specific with regard to the intended nature of implementation. We have shown how educators' actions aimed at implementing federal policy have direct effects on students at the local level.

A theoretical and methodological focus on the connection between the wider social context and local activities was essential to our research. We would not have understood the nature of educational practice had we concentrated on only one aspect of the politico-educational system. A few examples from our reserach will serve to illustrate this point. A key event in the special education referral process and in our research was the E&P Committee meeting (see Chapter 7). The main research strategy that we employed to study the committee's deliberation was to analyze the discourse of committee meetings. This technique was extremely useful in coming to understand the discourse of persuasion and the committee's presentational manner of reaching decisions.

Had we used this technique exclusively in analyzing the committee's work, however, we would not have been able to understand the significance of certain patterns that emerged. We tabulated the committee's decisions based on its reports (see Table 5 in Chapter 7). One pattern of the committee's work, however—the placement of students in special education programs outside the district at district expense— was not revealed either in the discourse in the committee meeting or in the table. No amount of discourse analysis, no amount of tabulation of the results of the committee's decisions, however carefully and meticulously conducted, would have shown that there remained a place-

ment option involving the expenditure of district funds for special education. The existence of that option was not available to inductive analysis, because it had been eliminated from consideration by administrative fiat long before committees met (see Chapter 4). We learned about the programmatic existence of that placement option only through our analysis of public law, accompanying administrative regulations, and observation of local practice outside of committee meetings. In this instance, knowledge of aspects of the system that lie beyond the borders of local events facilitated our analysis and understanding of local events.

In some cases, detailed knowledge of the workings of the school system made our understanding of its aggregated information possible. We were able to tabulate all the placements in the district by a careful examination of students' records (see Chapter 4). Our tables are similar in many respects to the information presented in so-called macro studies of larger social structures. However instructive aggregated information may be, our knowledge of the processes that assemble and surround it is limited if we confine our analysis only to aggregated information. If we limited our attention to these tabulations, we would learn how many students were placed in certain programs, but we would not know the educators' work and institutional practices that led to these arrays.

We extended our analysis further by observing educational practice throughout the district and by examining key decision-making junctures in the referral process. An important element in this investigation was the viewing sessions conducted with referring teachers and the results of these interviews juxtaposed against official school records. School records, which showed the official reason for students' referrals, were significantly different from the teachers' interview reasons for referral (see Chapter 5). One of these differences will serve to underline the value of linking the study of official textual records, which presumably display larger macro structures, to interactional activities in local scenes.

There was a correlation between reason for referral and student placement. Students who had been referred for strictly academic reasons (e.g., academic performance below grade level in a subject like math or reading), were placed in special education programs on the average of three out of four times. Students who had been referred for other reasons (including behavioral problems, psychological difficulties, or even a combination of psychological and academic reasons) were placed in special education programs half the time. This relation

between referral reason and student placement would have been our conclusion, had we left our analysis at this point. However, we discerned that many teachers during interviews gave reasons for referrals that went beyond those they had entered on referral forms. They emphasized the academic nature of the students' difficulties on official school records, but they discussed the social, psychological and behavioral aspects of the students' difficulties in interviews. Those teachers who were most successful in having their referrals placed in special education were the most likely to report different reasons for the referral during interviews. They had become knowledgeable about the demands of the referral process. Realizing that children with behavioral and social problems would not be as likely to be placed in special education, they emphasized the academic nature of their referral students' problems in order to have their students placed.

Let us underline the overall thrust of our proposal about the connection between distant and local levels of the politico-educational system for conceptions of social organizations. We are not simply making a recommendation to combine a quantitative and a qualitative analysis of some aspect of the society, nor are we proposing the use of qualitative research to generate hypotheses to be tested later by quantitative methods. Ours is as much a theoretical point as it is a methodological one. The theory of social interaction that informs our research is concerned with the ways in which the enduring and stable features of the social order are assembled. To be sure, one important place that this social construction work has been found is in the fine-grained analysis of the minute details of face-to-face interaction in a small number of events. We have attempted to demonstrate that face-to-face encounters are not the only place where this social construction work can be found. We have found social and educational identities to be assembled when educators work autonomously—filling in forms or writing reports. We have also found students' social identities to be constructed when groups of educators—in a committee—work on textual or documentary representations of students that come to the committee from previous face-to-face encounters.

In social institutions this social construction work functions in a step-wise, reiterative progression. A face-to-face encounter, for example, between teachers and students in the classroom, generates a product—a referral form, for example. This social product or educational fact becomes the basis for interaction at the next step in the process of generating handicapped students, e.g., the interaction between tester and student. That interaction, in turn, generates yet

another product—a psychological report, which then becomes the basis for the next step in the decision-making process, i.e., committee deliberations.

It is in this way that the process of moving from interaction to structure to interaction is reiterative. An interactional process at one step of the system becomes a structural product for the next step of the system. The reiteration of product and process, structure and interaction, at each step of the social organization is one of the reasons for our statements that the social interactional work that assembles the stable and enduring features of the social structure traverses situations and operates in broader institutional contexts.

The social situation is essential for escaping both psychological reductionism and objective reification when considering the ontological status of social institutions. In social situations we can see the impact of structures that exist at some distance. For example, federal policies or the organizational features of the school bureaucracy are visible on those particular occasions when educators organize their lives to reconcile federal policy and local considerations. Likewise, the operation of the practices that generate aspects of the social structure is visible on particular occasions and in aggregations of occasions across time.

It may be important to underline the point that this sense of situation reduces neither to the dispositions and beliefs of individuals, nor to the properties of collectivities. The former position, often called methodological individualism, maintains that statements about social order can be translated into statements about the internal, psychological processes of individual people, without the necessity of making reference to other people, surrounding contexts, or institutional arrangements. The latter, called methodological collectivism by Knorr-Cetina (1981), maintains that there is no level for the analysis of the social order below aggregates of social organizations.

Social configurations are not subjective in the way that dreams or flights of fancy are personal, nor are they objective in the way that mountains are material. Instead, they are constructed by the ongoing situated practices of the members of social organizations. Linkages between individuals and collectivities are possible, therefore, when the social situation is made the relevant methodological unit of analysis. This focus neither reduces institutions to psychological processes nor reifies organizations as objective entities. On the contrary, the psychological processes of individuals and the practices of institutions become visible in social interaction when the social situation is the subject of investigation.

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INDEX

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